

DOCUMENT RESUME

ED 201 607

SP 017 823

TITLE Writings From the Network. Teachers' Centers Exchange. Occasional Paper No. 7.
INSTITUTION Far West Lab. for Educational Research and Development, San Francisco, Calif. Teachers' Centers Exchange.
SPONS AGENCY National Inst. of Education (ED), Washington, D.C.
PUB DATE Oct 80
CONTRACT 400-80-0103
NOTE 33p.
EDRS PRICE MF01/PC02 Plus Postage.
DESCRIPTORS Adult Education; Annotated Bibliographies; Bilingual Education; Elementary Secondary Education; Fine Arts; *Information Networks; *Instructional Materials; Integrated Curriculum; Language Arts; Learning Processes; Mathematics Instruction; Problem Solving; Reading; Science Instruction; Social Studies; *Teacher Centers; *Teacher Developed Materials; *Teaching Methods

ABSTRACT

This annotated bibliography contains lists of curriculum materials, teachers' commentaries, articles, and books about adult and childrens' learning that have been written by participants in the network of American teacher centers. Citations are presented of writings in the following areas: (1) curriculum; (2) language arts; (3) mathematics instruction; (4) arts and crafts; (5) science instruction; (6) social studies; (7) learning processes; and (8) teacher centers. (JD)

* Reproductions supplied by EDRS are the best that can be made *
* from the original document. *

Teachers' Centers Exchange

Occasional Paper No. 7
October 1980

U.S. DEPARTMENT OF EDUCATION
NATIONAL INSTITUTE OF EDUCATION
EDUCATIONAL RESOURCES INFORMATION
CENTER (ERIC)

This document has been reproduced as
received from the person or organization
originating it.
Minor changes have been made to improve
reproduction quality.

• Points of view or opinions stated in this docu-
ment do not necessarily represent official NIE
position or policy.

ED201607

Writings from the Network

Here is a list of curriculum materials, teachers' commentaries, articles, and books about adult and children's learning that have been written by participants in the network of American teachers' centers. The Teachers' Centers Exchange, an information and referral center supported by the National Institute of Education, has since 1975 facilitated and stimulated communication within this growing network.

At the Exchange we have defined a teachers' center as a place or program where teachers come to work on curriculum for their classrooms and to participate in inservice education designed to meet needs they define themselves—all in an informal context that provides for sharing their successes and problems and encourages professional growth over a long period of time. There is a tendency to define a teachers' center mainly as a place or program for inservice training, but we think such a definition lacks two essential qualities of a professional development experience for teachers: first, participation in the development of the course of study and the curriculum materials that teachers use in their schools and classrooms; and, second, the sharing of teacher-developed materials with colleagues.

The first teachers' centers in the United States (and in England) set a priority for work to improve and update the curriculum, to make learning materials for students to work with "hands on," and to arrange learning experiences that were connected to students' lives and interests. This *curriculum* development was seen as central to *teacher* development and to uplifting the teacher's role into one that incorporated significant professional judgment and decision making. This priority is reinforced by the legislation authorizing federal support for teachers' centers: "... '(T)eacher center' means any site operated by a local educational agency ... which serves teachers, from public and nonpublic schools ... in which teachers ... may— (A) develop and produce curricula designed to meet the educational needs of the persons in the community, area, or State being served ...; and (B) provide training to improve the skills of teachers to enable such teachers to better the special educational needs of persons such teachers serve. ..."

SP 017823

We believe that if a teachers' center is to become a truly different forum and force for staff development, it must engage teachers not just in training but in reflection about what they are teaching, how they are teaching, and whom they are teaching, and it must provide ways to exercise thought, judgment, and experimentation in curriculum development. Teachers' centers staff members expressing these ideals have invented or adapted curriculum materials, and have printed them for sharing with local colleagues. As the network of teachers' centers has stretched across the United States, these materials have been exchanged among centers. In our effort to assist the development of individual teachers' centers, the Teachers' Centers Exchange has circulated such materials and has encouraged centers to share their publications with each other. This list of titles is meant to encourage more exchanges and to provide new teachers' centers an opportunity to collect materials from the network.

The list is organized into sections according to subject matter. Annotations briefly describe the materials and indicate how to acquire them. In most cases, the center from which the materials originated is indicated as the publisher. Where this is not obvious, the annotation tells how the writing is connected to the teachers' center movement. Some of these materials have been produced by people who are no longer closely involved with a particular teachers' center but are still communicating within the network of people interested in centers. The sections "About Teachers' Centers" and "About Learning" list some relatively recent articles and papers, not curriculum materials.

The list does not purport to be a review of the literature or a complete bibliography on teachers' centers or on curriculum development in teachers' centers. It is taken from materials that teachers' centers have sent as the result of participation in the network of centers that the Exchange coordinates. Thus it is entitled "Writings from the Network," and is offered as a sampling of the kinds of materials that staff and participants in teachers' centers have worked on over the past ten years or so. We hope this list will also be an inducement to enrich a teachers' center's library with materials from other centers, and an invitation to add new teachers' center developed materials to the network's collection.



**The National
Institute of
Education**

U.S. Department of Education
Washington, D.C. 20208

The project reported herein was performed pursuant to Contract No. 400-80-0103 from the National Institute of Education, Department of Education. However, the opinions expressed herein do not necessarily reflect the position or policy of the National Institute of Education, the Department of Education, or the Far West Laboratory for Educational Research and Development, and no official endorsement by these agencies should be inferred.

The Teachers' Centers Exchange, located at the Far West Laboratory for Educational Research and Development, 1855 Folsom Street, San Francisco, California 94103 (415-565-3095), is supported by the National Institute of Education.

Table of Contents

1. Mixed and Integrated Curriculum
2. Language, Reading, Bilingual
3. Mathematics, Problem Solving
4. Arts and Crafts
5. Science
6. Social Studies
7. About Learning
8. About Teachers' Centers
9. Periodicals



Mixed and Integrated Curriculum

Aboussie, Betty. *My Kansas City: A Historical Study of Kansas City for Fourth Grade Students*. 1980. \$12.50 plus 85¢ postage and handling. Order from *My Kansas City*. The Learning Exchange, 2720 Walnut, Kansas City, MO 64108. Make checks payable to The Learning Exchange.

For nearly three years, in a project called "My School, My Neighborhood, My Kansas City," volunteers from the Kansas City Junior League "brainstormed, researched, dressed up, dressed down, stitched maps, prepared materials, and arranged field trips so that Kansas City school children would learn their city's history and take pride in the preservation of their community." This booklet, which is a culmination of their efforts, as well as the efforts of the Kansas City Missouri School District and the educational staff at the Learning Exchange, focuses and expands upon much of the research and many of the activity ideas that the Junior League and The Learning Exchange worked out over the years. Some of the activities include designing a burlap wall mural and adding trails and businesses as students learn about them; building a covered wagon and planning a wagon train trip, complete with maps and supplies; studying early newspapers; and writing a class newspaper.

My Kansas City is "a guide that can be used as it is written or as a springboard for the creative efforts of the individual teacher," and as a model for teachers in other areas to study with their students the history of their community. "When children understand that it is people's lives that make history and that they... are living history, then they realize that they have an important role in determining the future."

Advisory for Open Education, Box 409, Middleboro, MA 02346. All orders must be prepaid. These curriculum ideas and materials designed for Education Development Center's Early Childhood Education Study provided ideas for the first American teachers' centers, and they remain useful today.

Building with Cardboard. A booklet showing how to work with triwall cardboard. Included are instructions and designs for tables, bookcases, stools, easels, playhouses, puppet stages. 22 pp. \$1.30.

Building with Tubes. A booklet showing how to work with heavy cardboard tubes discarded by business and industries to make stools, tables, cubbies, shelves, cradles, etc. \$1.30.

Building a Playground. A booklet describing the making of a community-built playground in Houston. Includes plans, materials list, and photographs. 19 pp. \$1.30.

Building with Tires. Suggestions for using tires in play equipment such as swings, climbers, and tunnels. Includes photos and drawings showing techniques for joining and suspending tires. 32 pp. \$1.95.

Single Sheets. A packet of 8½" x 11" illustrated cardboard pages, each providing easy directions and enticing illustrations for making a learning activity for preschool and primary children. Hats from scrounge, building blocks from milk cartons, trays from mixing colors. From the Early Childhood Education Study at Education Development Center. Single Sheets Nos. 1 and 2 (set of 14 sheets)—\$1.63; No. 3 (6 sheets)—98¢.

Children Printing. The use of the letter press and silk-screen press in classrooms for grades 1-6. The book contains examples of children's work and instructions. \$1.95.

African Primary Science Program. (All five of the following are for lower primary.) 1969. Whole set \$5.20. This Education Development Center Curriculum was a pioneer and remains a classic in the use of natural materials for teaching science.

—*Introduction*. This booklet discusses the value of activity periods and the role of the teacher in providing activities, finding and organizing materials, and observing and recording the involvement of students. 36 pp. \$1.63.

—*Dry Sand*. Investigates language, science, and mathematics possibilities in the materials. 9 pp. \$1.30.

—*Wet Sand*. Indoor and outdoor activities. 8 pp. \$1.30.

—*Water*. Pouring, measuring, water pressure and flow; sink and float, mixing colors, and soap bubbles. 17 pp. \$1.30.

—*Woodwork*. Working with tools: simple construction for young children. 9 pp. \$1.30.

Alberty, Beth, and Weber, Lillian. *Continuity and Connection in Curriculum*. 1979. 92 pp. \$3.50. Order from Workshop Center for Open Education, 6 Shepard Hall, City College, 140th Street and Convent Avenue, New York, NY 10031.

This is a case study of how several New York City teachers integrate subject-matter studies around encompassing themes, which the teachers select out

of their own and students' interests and past experience. The aim of the teachers' curriculum development is to make classroom learning continuous with and connected to their students' everyday lives and interests. The study was funded by the National Institute of Education. The teachers' ability to develop their idiosyncratic and intellectually engaging and integrating classroom projects is seen as an outcome of the support they have received from Open Corridor rationale and assistance from Workshop Center advisors.

Anderson, Joyce. *Language Arts and the Integrated Curriculum*. 1976. 30 pp. \$1. Order from Minneapolis Public Schools/University of Minnesota Teacher Center, 155 Peik Hall, 159 Pillsbury Drive, SE, University of Minnesota, Minneapolis, MN 55455.

A teacher guide including a chart for integrating math and language arts and a 20-page appendix of ideas and materials.

Apelman, Maja. *Parents and Children: Partners in Learning*. 1979. 31 pp. Single copies free. Order from Virginia Plunkett, Colorado Department of Education, 201 East Colfax Avenue, Denver, CO 80203.

The author writes, "I have put together a list of activities which parents can try with their children to help extend some school learning in and around their home. . . . Most of the activities can be adapted to children of any age." A sample of the activities are: size, shape, and age of your house; preserving and measuring food; geography and machines in the supermarket; sounds; mapping; time; and family history and statistics. Apelman is on the staff of Mountain View Center for Environmental Education, Boulder, CO.

Buchan, Barbara. *Paraphernalia*. 1979. \$3.50. Order from Education Development Center, Distribution Center, 55 Chapel Street, Newton, MA 02160.

A book designed to support integrated learning for those working with children three to ten. Each piece of equipment designed, or activity outlined, is introduced with reasons for its inclusion in the classroom, along with lists of materials needed, directions, drawings, or illustrations where necessary. Activities include classroom gardening, potting, aquaria, terraria, dramatization, electricity, puppeting, painting, batik, literacy crafts.

Bush, Gloria, ed. *The Adventures of the Flight of Apollo 35*. 1972. 39 pp. \$1. Order from Philadelphia Teacher-Parent Center, Durham School, 16th and Lombard Streets, Philadelphia, PA 19146.

A diary and teacher's notes on the work of 15 seven-to-ten-year-olds recorded by a teacher, Gloria Bush.

The children move through "spaceship" dramatic play, to construction, wiring, flight planning, and finally designing, mapping, and research. An example of integrated curriculum growing out of a teacher's skill in guiding child-initiated activities into significant learning experiences.

Cook, Ann; Mack, Herb; Stein, Leslie; Bruni, Jim. *Go Fly a Kite*. 1976. 64 pp. \$2. Order from Community Studies Inc., 670 West End Avenue, New York, NY 10025.

A booklet about kite projects kids have done, including information about types and sizes of kites, the physics of kite flying, and a bibliography of books about kites. An example of an integrated curriculum project encompassing art, math, science, social studies, and language arts, which lasted for several weeks in one elementary classroom.

Cook, Ann; Parker, Harriet; Stein, Leslie. *Home Cooking for Kids: Ethnic Recipes from Home for School (Cocina Casera para Niños)*. 1974. 48 pp. \$2.50. Order from Community Studies Inc., 670 West End Avenue, New York, NY 10025.

An illustrated book of black and Puerto Rican recipes suitable for first grade and older children. In addition to the recipes there are transcripts of interviews with an elderly black woman and a Puerto Rican mother, "Let's Talk about Soul Food" and "Let's Talk about Puerto Rican Food."

Dimoff, Eleanor. *Explorations of Visual Phenomena*. 1973. 18 pp. 75¢. Order from Workshop Center for Open Education, 6 Shepard Hall, City College, 140th Street and Convent Avenue, New York, NY 10031.

An oversize book (12" x 18") that provides ideas and methods for exploring perspective, scale, binocular vision, and dimensions. Can lead to other explorations in art, mathematics, astronomy, architecture, study of vision or lenses, shadows, or perception.

Dragons Are Too Seldom Puppet Theatre. Department M, 649 Main Street, Deadwood, SD 57732.

Some Puppet Ideas & Stuff for Teachers. Suggestions in math, history, science, and reading from Dragons' teacher workshops. Also information on puppet playwriting and puppet stages. 1978. 4 pp. \$2.

Some Puppet Patterns & Stuff, by Claire E. Scholz and the Dragons Are Too Seldom Puppet Theatre. Patterns for paper, paper-maché, sock, mitten, and other puppets. 1978. 40 pp. \$4.50.

Dropkin, Ruth, ed. *Teachers with Children: Curriculum in Open Classrooms*. 1976. 68 pp. \$3.50. Order

from Workshop Center for Open Education, 6 Shepard Hall, City College, 140th Street and Convent Avenue, New York, NY 10031.

Accounts by teachers of their curriculum work in reading, math, social studies, and science, grades 1-6, introduced by an essay on curriculum by Lillian Weber. Much of the work reported connects across curricular areas, and the accounts include children's work. The selections, sharing teachers' experiences of professional growth, include "Documenting the Process," by Catherine Molony.

Dropkin, Ruth, ed. *The Workshop Center Sampler*. 1974. 86 pp. \$2. Order from Workshop Center for Open Education, 6 Shepard Hall, City College, 140th Street and Convent Avenue, New York, NY 10031.

Accounts from teachers and Workshop Center staff of their work with children in making things (weaving, photography, woodworking, cooking, drawing, kite making, printing, batik); in language curriculum (communication, language games, spelling); in science activities, field trips, movement, music, and math. There are also sections on classroom arrangements, organization, and record-keeping, and on resources (bibliographies for each activity; people and places to write or visit; sources of scrap materials; list of nonsexist books for grades K-3; lists of resources for black studies and Asian American studies).

Engel, Brenda S. *Arranging the Informal Classroom*. 1973. 88 pp. \$3.60. Order from Education Development Center, 55 Chapel Street, Newton, MA 02160.

A guide to classroom environment that considers use of walls, doors, and windows; furniture options; space and materials necessary for art, math, music, science, and dramatic play. Includes sample plans. Emphasis is on ingenuity, rather than on cash outlay. Brenda Engel was formerly an advisor at the Greater Boston Teachers Center.

Fordham District 3 Learning Center. *A "How-To" Book of Americana: Interdisciplinary Activities for the Classroom*. 1976. \$2.85. Order from Fordham District 3 Learning Center, Room 1024, 113 West 60th Street, New York, NY 10023.

Suggests topics and activities organized around colonial history in the U.S. Includes science, dance, social studies, language arts, cooking, media, arts and crafts, and trips in the New York area.

Goldberg, Karen, and Linford, Mary Jeanne, eds. *What a Wonderful Idea*. 1980. Request information on price. Order from Seattle Child Care Resource Center, Seattle Central Community College, 1701 Broadway, Seattle, WA 98122.

A collection of ideas in notebook form for activities for children from infancy to school age. It is possible to order a monthly "ideas subscription" to add to the notebook.

Hensel, Pamela L. *Mainstreaming: An Informational Source for the Regular Classroom*. 1979. 135 pp. \$3.50. Order from Wood County Area Teacher Center, 1 Courthouse Square, Bowling Green, OH 43402.

A fourth-grade teacher developed this booklet for the regular classroom teacher to inform and clarify questions related to mainstreaming the physically and mentally handicapped into the regular classroom and to provide suggestions for teaching these children.

Hunter, Peggy. *How to Put It All Together: A Handbook on Organizing Space in the Informal Classroom*. 1977. 16 pp. 75¢. Order from Minneapolis Public Schools/University of Minnesota Teacher Center, 155 Peik Hall, 159 Pillsbury Drive, SE, University of Minnesota, Minneapolis, MN 55455.

Checklists, charts, and cutout furniture templates for trying out various room arrangements. Shows one sample floor plan and cautions about problem areas.

Katz, Betsy, and Reikes, Vicki. *Frame Games*. Order from Bureau of Jewish Education, 1580 Summit Road, Cincinnati, OH 45237.

Six multipurpose gameboards, each suitable for a variety of activities by changing the content materials. Includes grid games, racing boards, card games, individualized self-checking materials, and boards for sorting, sequencing, labeling. Developed by staff members of the Cincinnati Jewish Teacher Center.

Linford, Mary Jeanne; Monigold, Jeannette; and Chatten-McNichols, Barbara. *Program Planning Notebook*. 1980. \$8.95. Order from Seattle Child Care Resource Center, Seattle Central Community College, 1701 Broadway, Seattle, WA 98122.

A planning workbook for early childhood teachers. Included are envelopes to hold ideas and activity cards, child information/assessment cards, an emergency information page, local social/health service and resource referrals, and much more.

Locke, Fred, and Felsten, Janet. *Disc Book*. 1974. 32 pp. \$2.50. Order from Philadelphia Teacher-Parent Center, Durham School, 16th and Lombard Streets, Philadelphia, PA 19146.

How to use recycled 1/8" thick cardboard circles in many different classroom projects.

The Maryland Committee for Children, Inc., 2011 North Charles Street, Baltimore, MD 21218.

Math Activities for Children. Ages two to seven. "Based on a philosophy that children acquire concepts by actively participating in tangible activities." 27 pp. \$2.50.

Building Musical Instruments for Children. How to build instruments such as an "oyster can bass, an inner tube drum, and a milk bottle banjo using recycle materials." 17 pp. \$2.50.

Making Language Materials for Children. How to make "materials which encourage children's imaginative use of language . . . from everyday familiar junk." 18 pp. \$3.

What to Look for in a Child Care Center. Discusses considerations and logistics for choosing a child care center. 6 pp. \$1.50.

Child Advocacy in Maryland: A Resource Guide. "It is not enough to fight for the creation of programs for children . . . without appropriate funding, nothing will happen . . . The Maryland Committee for Children prepared this material with the hope that it would be of help to you in understanding the systems by which legislation is passed in Maryland and in the federal government." 34 pp. \$3.50.

reStore Booklet. Gives ideas about what to do with recycled materials. 22 pp. \$1.50.

Olds, Henry F. Jr.; Schwartz, Judal, L.; Willie, Nancy A. *People and Computers: Who Teaches Whom?* 1980. 78 pp. \$3.25. Order from Cognitive Research Group, Education Development Center, 55 Church Street, Newton, MA 02160.

Teachers' center staffs and participants from Oak Ridge (TN), French Rivers (MA), and Goddard (VT), contributed to this study of the educational applications of computers by TORQUE staff members at EDC. Among them is Henry Olds, a longtime teachers' center worker and supporter. The report considers computers as an instructional medium, as a tool, and as a tool maker. The authors conclude that "the computer provides students and teachers with an opportunity to depart from traditional practice in profoundly important ways—ways that will enhance the intellectual growth of students and teachers and lead them both to assume a major share of responsibility for their own education." An appendix describes a number of instructional programs.

Open Space Teacher Center. *King's Salad.* 1977. 50 pp. \$3. Order from Open Space, c/o The Learning Place, 218 Marine Street, Santa Monica, CA 90405.

A set of teachers' idea sheets whose purpose is to help teachers "bring creativity, spontaneity, and fun to the teaching of basic skills."

Pederson, Clara A., ed. *Parents and Schools.* 1976. 51 pp. \$2.20 prepaid. Order from Clara A. Pederson, Box 8158, University of North Dakota, Grand Forks, ND 58202. Make checks payable to University of North Dakota.

In *Parents and Schools*, Vito Perrone states the position "that schools desiring the fullest possible growth—personal and intellectual—of children must actively encourage parent participation, accept parents as valuable teachers, nurture increased levels of teacher-parent interaction." This booklet contains a number of informal articles, including "How to Use Parents and Community in the Classroom and Vice Versa," and "Some Things for Parents to Look at and to Listen for in Visiting Schools."

Puppetry in Education News. 12 pp. \$10 year for 6 issues. Back issues available: 1977-78, 6 issues \$10; 1978-79, 6 issues \$10. Order from PIE News, 164 27th Street, San Francisco, CA 94110.

A news magazine written by professional puppeteers and educators for teachers and librarians interested in using puppetry. Most issues address a special topic such as language arts, multicultural and bilingual programs, library usage, therapy, and ecology. Regular features are a "hands-on" column, book and materials reviews, shared experiences of teachers, and descriptions of puppet programs and curriculum. Each year subscribers receive a comprehensive resource guide containing reviews of books, manuals, films, and listing puppet kits, cassettes, books, and services to buy.

Rasmussen, Lore. *From "My Ball" to "Sphere."* 1972. 25 pp. \$1. Order from Philadelphia Teacher-Parent Center, Durham School, 16th and Lombard Streets, Philadelphia, PA 19146.

The subtitle of this booklet is "Taking the Time to Think About and Explore with Children the Same Thing Over a Long Time and in Unexpected Ways." Through examining balls and other spherical natural objects children learn about many aspects of geometry, symmetry, sphere formation, motion, volume, geography, imagination, and wonder.

Sargent, Betsy. *The Integrated Day in an American School.* 1972. 80 pp. \$4.50 prepaid for NAIS members; \$5.75 prepaid for non-members. Order from National Association of Independent Schools, 18 Tremont Street, Boston, MA 02108.

A curriculum report on the work of the author's five-through seven-year-olds during one year at the Shady Hill School in Cambridge, MA. Includes a schedule, maps of room arrangements, and descriptions of room areas (library; writing, math, painting, clay, scrap, and block corners; water play and dramatic play areas). Materials, activities, and participating children are described, as are comments on extensions of learning and changes over time. Experiences that served to integrate the curriculum are also described: the circus, the undersea world, Lieke's 11 puppies, the print shop, knights and castles, and the outside yard. Books read to the class and trips taken are listed. The book helps teachers think clearly and with curriculum breadth and depth about the uses of materials in a primary classroom. It is invaluable for beginning teachers and especially useful to teachers of mixed-grade classes. The author was a participant in the Greater Boston Teachers Center.

Seidman, Mary; Sentkowski, Alan; Smith, Mary; Lentz, Bob. *Teaching Through Adventure: A Practical Approach*. 1976. 97 pp. \$4.50 plus \$1 postage and handling per order. Order from Project Adventure, POB 157, Hamilton, MA 01936.

This book, written for teachers and administrators, contains samples of adventure curriculum taken from high schools and middle schools. Some are interdisciplinary; others describe programs in English, social studies, science, and art. The book suggests ways to use the out-of-doors and the world outside the classroom to broaden and enliven more traditional academic subjects, and contains illustrations, sample worksheets, and down-to-earth advice on planning and implementing.

Other books in the series include *Cow Tails and Cobras: A Guide to Ropes Courses, Initiative Games and Other Adventure Activities* (\$6.50); *Cranking Out Adventure: A Bike Leader's Guide to Trails and Error Touring* (\$3); and *Going Camping! A Basic Guide to Camping with Students* (\$2).

Mimeographed Curricula: "Cape Cod: A Working Manual." A workbook of field ecology used by biology students on a two and one-half-day field trip (60¢); "Urban Awareness" (50¢); "The Seacoast as Teacher" (75¢). Evaluation reports concerning Project Adventure programs are also available.

Simons, Robin. *Recyclopedia*. Boston: Houghton Mifflin Co., 1976. 118 pp. \$9.70 (\$5.70 paper). Order from Museum Shop, Children's Museum, 300 Congress Street, Boston, MA 02110.

Games, science equipment, and crafts from recycled and ordinary household items, developed by Robin

Simons, a founder of the Resource Center at the Boston Children's Museum. Teachers can use this book to help children look more thoughtfully and responsibly at the environment. Teachers' centers can use it to decide whether to install a recycle area in the center and how to make learning materials from scrounge material.

The Teacher Center, Inc. *Using Foods*. 1974. 87 pp. \$4. Order from The Teacher Center, Inc., 425 College Street, New Haven, CT 06511.

A book with recipes and suggestions for studying measuring, planting, dyeing, nutrition, cultural history, and other areas, using foods as a tool for learning.

Teacher Place. *Learning Posters, Activities and How To's*. Order from Teacher Place, 380 North Pine Street, Burlington, WI 53105.

"Tongue Twisters I," "Optical Illusions," "Seven Corpse Dinner," and "Compare-Contrast Game Board": \$2 each plus shipping handling (73 cm. x 48 cm. white lightweight tag with black printing).

"Printing-Printing," "Dutch Kite," "Equilibrium," "Nail Cookies," "Tongue Twisters 2," "Grid," "Creative Egg Decorating," "Speaking Marionettes," "Eye Ball Benders," "Pennsylvania Dutch Hex Signs," "Who's Who," and "Tangram." \$1 each plus shipping/handling (45 cm. x 58 cm. on paper, white with black printing).

Shipping/handling: 35¢ per item with a \$1.25 minimum. All 16 posters: \$20 (shipping included, for set).

Wigginton, Elic. *Moments: The Foxfire Experience*. 146 pp. \$7.25. Order from Institutional Development and Economic Affairs Service, Inc., Magnolia Star Route, Nederland, CO 80466.

This illustrated book presents the philosophy and learning process underlying Foxfire programs. The book describes four levels of student development in Foxfire programs—"major learning moments"—according to degrees of complexity and also in developmental sequence. The first level focuses on confidence building through basic skills; the second on application of these skills while students work together; the third on sensitivity to others; and the fourth on creative independence within a larger community framework.

Wood, Pamela. *You and Aunt Arie: A Guide to Cultural Journalism Based on Foxfire and Its Descendants*. 1975. 219 pp. \$8.95. Order from Institutional Development and Economic Affairs Service, Inc., Magnolia Star Route, Nederland, CO 80466.

A guide to cultural journalism based on *Foxfire* and its descendants with an introduction by Eliot Wigington.

"You've decided to help put out a magazine, a 'Foxfire' type magazine and you're not sure what you're getting into. If you could talk to some of the kids in Georgia or Hawaii or Mississippi or Maine who have already done it, you could find out.

"But that's not possible, not unless you happen to live where one of the magazines has gotten started. So what else can you do?

"Maybe some of these pages will help. They're based on the experiences of kids on dozens of magazines . . . that think of themselves as 'Foxfire' projects.

"Nothing in here is the final word, never will be as long as new Foxfire projects keep starting and old projects keep changing. You'll have some words of your own to add after you've been at it a year."

Workshop for Learning Things. 5 Bridge Street, Watertown, MA 02172. The publications below were developed by one of the first American teachers' centers. The Workshop is no longer a teachers' center, but a classroom materials supply house that continues to sell "learning things."

Cardboard Carpentry Workshop. A whimsical, yet practical description with pictures of a triwall cardboard workshop, an easel, a climbing tower, a canoe, a twin-hulled sailboat, and other creations. 1972. 36 pp. \$2.95.

Further Adventures of Cardboard Carpentry. More than 300 drawings and photographs; plans, old and new; and helpful hints on using cardboard as a versatile construction material for making classroom furniture. 1973. 72 pp. \$4.95.

Our Catalog. Includes materials for teaching language (for example, papermaking, printing, book-making, photography), use of space, building with cardboard, tools and technology, mathematics, books, and more. Many of the materials were developed collaboratively by teachers. Annual. 40 pp. 50¢.

Zubrowski, Bernie. *Children's Museum Activity Books.* Ages 8-12. 1979. 64 pp. \$8.70 each (\$5.70 paper). Order from Museum Shop, Children's Museum, 300 Congress Street, Boston, MA 02110.

Ball-Point Pens. Do you want to make a simple pump or a thermometer? Use a ball-point pen. This book invites the reader to use ingenuity to discover all the practical uses one everyday object can have.

Bubbles. While seeming to be almost fantastic creations, bubbles are, in fact, made in very precise

ways. In this book the reader can learn how to make constructions with bubbles, how to touch a bubble without breaking it, and how to make huge bubbles. Young people can learn by doing, making soap and water bubbles.

Milk Carton Blocks. Take a square half-gallon milk carton, and instead of throwing it away, turn it into a building block. With these milk carton blocks teachers and children can build all kinds of structures, buildings, arches, bridges—each of which demonstrates basic laws of science. Useful for group projects, this book brings out the architect in all of us.



Language, Reading, Bilingual

Allison, Penelope W. *Games and Activities for Teaching the Alphabet.* 1977. 32 pp. \$1.15. Order from Philadelphia Teacher-Parent Center, Durham School, 16th and Lombard Streets, Philadelphia, PA 19146.

Collection of ideas on ways to teach the alphabet, with illustrations for coloring.

Brace, Barbara; Dewey, Marlene; Roemmelt, Gail. *Reading Games in the Content Areas.* 1978. 24 pp. \$2.50. Order from Reading Resource-Study Skills Center, Cicero High School, Route 31, Cicero, NY 13039.

Contains 25 pages of games for skill development in grades 7-10 (or 11 and 12 remedial). Activities are designed to be reproduced easily by the teacher. Skills to be developed by these games include following directions, logical thinking, sequencing, generalizing, reinforcing content, finding the main idea, listening, and so forth.

Buschur, Sharon. *Reading in the Content Areas.* 1979. 69 pp. \$3.50. Order from Wood County Area Teacher Center, 1 Courthouse Square, Bowling Green, OH 43402.

A first-grade teacher has written this guide for teachers in the content areas (e.g., science, health, social studies) to assist them in teaching their students to read required course material. "The primary goal of reading instruction in any area is to make the student an independent learner. . . . The student should be taught not only the course material, but should also be given a process for deriving the information on his own."

Bush, Gloria. ed. *Companions*. 1974. 21 pp. \$1. Order from Philadelphia Teacher-Parent Center, Durham School, 16th and Lombard Streets, Philadelphia, PA 19146.

This booklet describes how to teach a simple poetic form—couplets (five-line poems)—to children, and includes poems written by nine- to twelve-year-olds during the school year.

Bush, Gloria S. *From Fluorescent Sandpaper to Shiny Orange Poems*. 1974. 129 pp. \$3. Order from Philadelphia Teacher-Parent Center, Durham School, 16th and Lombard Streets, Philadelphia, PA 19146.

"Painting pictures with words is as natural to children as handclapping, especially when they have had successful and satisfying opportunities to do so." Here is a guide for providing those opportunities by equipping and teaching in a poetry writing room (or space) within a classroom or school or teachers' center. The author also includes samples of the poetry written by her students at the Durham School in Philadelphia.

Buxton, Amity P. *Children's Journals: Further Dimensions of Assessing Language Development*. Paper presented at Canadian Council of Teachers of English International Conference on Writing, Ottawa, May 11, 1979. 30 pp. \$2. Order from Teacher Shelter, Oakland Unified School District, 1025 Second Avenue, Oakland, CA 94606.

This study done at the Oakland Teacher Shelter "presents another way of looking at young children's writing by setting forth dimensions for analyzing and assessing the spontaneous writing (and drawing) in daily journals. This approach is based on the developmental theory that suggests that 'basic' language skills show their primary growth at some point during the five- to eight-year-old period, depending upon the individual, his or her environment, and his or her teacher, parent, and peer social group." The study is based on the idea "that one learns writing by writing and that writing improves developmentally with spurts and plateaus." The paper presents an alternative assessment method that complements traditional evaluation and research methods and gives teachers rich, practical, authentic material for identifying children's individual competencies and deep interests.

Community Studies Inc. *Tell It Like It Is*. 1974. 96 pp. \$2. Order from Community Studies Inc., 670 West End Avenue, New York, NY 10025.

A paperback book growing out of teachers' center projects focusing on the use of slang (with an emphasis on New York City). Activities include grain-

mar and writing, dictionary skills, and communications for junior high school students.

Kohl Jewish Teacher Center. *Teaching the Soviet Child: A Handbook for Jewish Teachers*. 1980. \$7.10. Order from Kohl Jewish Teacher Center, 161 Green Bay Road, Wilmette, IL 60091.

Compiled for a conference on teaching the Soviet Jewish child, this notebook could be adapted to teaching any immigrant children in the US—Asian Americans, Latin Americans, and so forth. Contains numerous Jewish cultural and religious learning activities, with directions in both English and Cyrillic. Also includes papers and articles on Russian Jewish students in the US.

Kohl Teacher Center. *From Teacher to Teacher, Bright Ideas in Language Arts*. 1978. 104 pp. \$7.75. Order from Kohl Teacher Center, 415 Green Bay Road, Wilmette, IL 60091.

"The Teacher Center exists to provide opportunities for teachers to interact and learn from each other. This book, and the sharing day it documents, is one product of that ongoing process." The book contains language arts ideas contributed by K-8 teacher participants.

LeBreton, Laurie. *When Reading Leaves School*. 1979. 28 pp. \$3. Order from Education Resource Center, 735 West Sheridan, 2nd Floor, Chicago, IL 60613.

"This book is for parents, day care center workers, camp counselors, librarians, and for anyone else who wants to help children read better. It contains suggestions for a large variety of reading activities that work well outside of school."

Marin Teachers' Learning Cooperative. *Teachers Writing*. 1980. 91 pp. \$2. Order from Marin Teachers' Learning Cooperative, Marin County Office of Education, 1111 Las Gallinas Avenue, San Rafael, CA 94903.

"The pieces of this booklet were written during the course of two Bay Area Writing Project workshops in the Spring of 1980—one, a ten-session series for teachers new to BAWP, and the other a five-session series for teachers with previous BAWP experience. Although the teachers wrote many different short pieces in the workshop sessions, the selections included here are those they chose to revise for publication. . . . (T)hey are excellent evidence of the BAWP principle that a good teacher of writing writes.

"The three sections of this booklet present teachers writing about their lives, . . . about their work in the classroom, and . . . about teaching strategies. . . . It

is the intent of *Teachers Writing* to provide a format in which praises are sung, ideas are shared, and writing is enjoyed for its own sake."

Martin, Anne, and Paradise, Muffy. *Extending Experience with Literacy Crafts*. 1979. 7 pp. \$1. Order from Teacher Center Brookline, 88 Harvard Street, Brookline, MA 02146.

A teachers' center director and a participating fourth-grade teacher describe their work at the center and in classrooms in "literacy crafts": making books, paper, printing, calligraphy, classroom publishing, storytelling, and journal keeping. One of several occasional papers published by the Teacher Center Brookline to encourage and enable teachers to write about their work.

Meier, Deborah. *Reading Failure and the Tests*. 1973. 38 pp. 75¢. Order from Workshop Center for Open Education, 6 Shepard Hall, City College, 140th Street and Convent Avenue, New York, NY 10031.

A booklet for educators, parents, and others that discusses biases (such as dialect, class, speed, teacher strategy) reflected in standardized reading tests. It shows how reliance on the tests hampers and distorts the teaching of reading, and presents alternatives to standardized testing. Includes references and a bibliography.

North Dakota Study Group on Evaluation. *Standardized Reading Tests*. Each booklet 70¢. Make checks payable to and order from North Dakota Study Group on Evaluation, Box 8158, University of North Dakota, Grand Forks, ND 58202.

What Does that Score Mean? by Ann Cook, Deborah Meier, and Florence Miller. This booklet explains for parents and teachers how standardized tests are scored and discusses the implications of a scoring system that automatically places half the students below grade level when educators and politicians call for all children to score on grade level.

Do They Help or Hurt our Child? by Ann Cook and Deborah Meier. This booklet examines the harmful effects of standardized tests on children's reading ability, self-concepts, confidence in schools, and the curriculum they study.

Pederson, Clara A., *Reading and Language Arts I*. 1978. 154 pp. \$4.40 prepaid. Order from Clara A. Pederson, Box 8158, University of North Dakota, Grand Forks, ND 58202. Make checks payable to University of North Dakota.

Thirty-three articles by many contributors. Titles include "Reading: Through Eyes of an Infant, Child

and Adult," by Glen E. Olson; "Comprehension: Goal of Reading Instruction," by Larry A. Harris; "Sustained Silent Reading," by Robert A. McCracken; "Language Development in Intermediate Classrooms," by Sheldon Schmidt; and "One Hundred Suggestions for Sentence or Story Starters," by Clara Pederson.

Rudman, Masha. *Children's Literature: An Issues Approach*. 1976. 433 pp. \$11.95 (\$8.95 paper). Order from D. C. Heath, 125 Spring Street, Lexington, MA 02173.

The chapters of this book are: "Siblings," "Divorce," "Death and Old Age," "War," "Sex," "The Black," "The Native American," "The Female," and "Using Children's Books in a Reading Program." Each chapter includes examples from particular books to show how the topic is handled in children's literature, activities for improving reading skills, activities to expand and personalize the discussion, an annotated list of sources relating the topic to children and to books, and an annotated bibliography of children's books pertaining to the topic. Masha Rudman is a professor at the University of Massachusetts, Amherst, who co-directs the Integrated Day Program.

The Teacher Center, Inc. *Literacy and the Inner City Child: Towards a Policy*. 1978. 106 pp. \$3.50. Order from The Teacher Center, Inc., 425 College Street, New Haven, CT 06511.

Proceedings from a one-day conference at The Teacher Center, Inc., on literacy and the inner city child. Notes are included from discussions and speeches on minority literacy and language attitudes, tests and evaluation, bilingual-bicultural options, the roots of Black English, racism and children's literature, and music as language.

Teachers & Writers Collaborative. 186 West 4th Street, New York, NY 10014.

Whole Word Catalogue, edited by Rosellen Brown, et al. This is a practical collection of assignments for stimulating and motivating student writing, with many samples of student work at both elementary and secondary levels. Particularly appropriate for situations that require starters—with activities for personal writing, collective novels, fables, parodies and spoofs, diagram stories, and language games. Includes an annotated bibliography. 72 pp. \$4.

Whole Word Catalogue Two, edited by Bill Zavatsky and Ron Padgett. Offers writing gimmicks, as well as projects, including art, television, ecology, history, and essays on creativity in the classroom. Advice on how to write everything from haiku to

horror stories; ways to publish student work; dramatic improvisations; techniques for songwriting and music making; and help for children with learning problems. Includes imaginative creations by children and an annotated bibliography. 352 pp. \$6.95.

Bilingual Bicultural Materials: Chinese Culture Set. Materials on the culture and traditions of China compiled from overseas and Chinese-American sources. Five booklets and cassette tape. \$8.50. *Puerto Rican Culture Set.* "Songs of My Island," and "Christmas in Puerto Rico." Two booklets and cassette tape. \$5.50.

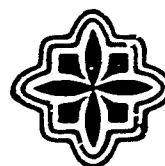
Tobier, Arthur, ed. *Teaching Bilingual Children.* 1974. 54 pp. \$2. Order from Workshop Center for Open Education, 6 Shepard Hall, City College, 140th Street and Convent Avenue, New York, NY 10031.

Descriptions of a bilingual program by the principal, an advisor, teachers, and students at PS 75 in Manhattan. Discussion of philosophies and attitudes underlying such a program. Descriptions of related programs and reminiscences by bilingual teachers. Also available: four pamphlets of PS 75 children's writing: "Habia Una Vez..." Compiled by Pilar N. de Lago. Order these from PS 75, 735 West End Avenue, New York, NY 10025.

Touchstone Center. "Sing We of Creeping and Crawling Things." \$2.50. A poster-booklet made up of myths, legends, and poems about amphibians and reptiles. Other publications are "Before There Was Thunder," \$3; "The First Dot Was the Dinosaurs," \$3.50; "Out of My Body," \$2; "The Hospital Poster," \$3; "In This Cave, Earth Began," \$2; "Air Sings, Earth Dances," \$2; "The Paper," \$3. Order from the Publisher Center, 625 Broadway, New York, NY 10012.

West Charlotte Open High School. *Cotton Seed Anthology.* 140 pp. \$1.75. Make checks payable to Charlotte-Mecklenburg Board of Education. Order from Carol Newman, Teaching/Learning Center, 428 West Blvd., Charlotte, NC 28203.

A magazine published by 15 urban high school English students whose goal was to preserve the vanishing history and heritage of the Charlotte area. The students interviewed local residents and then wrote articles "on everything from quilt making to city planning." An advisor from the teachers' center worked in the classroom with the teachers and students during this effort.



Mathematics, Problem Solving

Burns, Marilyn. *The Brown Paper School Series.* Order from Little Brown and Co., 200 West Street, Waltham, MA 02154

The Book of Think: How to Solve Problems Twice Your Size. A book about thinking and problem solving for kids and their teachers, or anyone. Helps you know what to do when you're puzzled or perplexed. Marilyn Burns was a founder of the Teachers' Active Learning Center, now the Teacher Shelter, Oakland, CA. 1976. 128 pp. \$7.95 (\$4.95 paper).

The I Hate Mathematics! Book. Uses observation and inquiry (on subjects such as sidewalks, shoelaces, and toilet paper cylinders) and mathematical tricks and riddles to introduce complex concepts to children over nine. By a group of California teachers, writers, and artists who prepare books "for kids and grownups to learn from together." 1975. 127 pp. \$7.95 (\$4.95 paper).

This Book Is About Time. "A collection of ways to look at time: ways to explore time alone, experiments to do with a friend, and interesting timely information to ponder. You'll learn about how time is changing in our jet age and how that doesn't matter at all to a fiddler crab; find out about biorhythms and how to make different kinds of clocks." 1978. 128 pp. \$7.95 (\$4.95 paper).

Charbonneau, Manon. *Learning to Think in a Math Lab.* 1971. 90 pp. \$4.50 prepaid for NAIS members; \$5.75 prepaid for non-members. Order from National Association of Independent Schools, 18 Tremont Street, Boston, MA 02108.

Examples of exciting mathematics work done by fourth- through sixth-graders in areas such as measurement, scale, mapping, geometry, tiling, metrics, and numbers. Includes task cards for all activities. The author, a former teachers' center director, has written an account of her mathematics laboratory that raises questions and offers thought-provoking solutions for any learning situation.

Fehlen, Joan E. *Mathematics and the Integrated Curriculum.* 1975. 15 pp. \$1. Order from Minneapolis Public Schools/University of Minnesota Teacher Center, 155 Peik Hall, 159 Pillsbury Drive, SE, University of Minnesota, Minneapolis, MN 55455.

Describes the mathematics curriculum at Marcy Open School. Contains information on materials linked to Piaget's levels of development; a statement of philosophy about drills and testing; examples of integrating curriculum; and a ten-item bibliography.

Fordham/District 3 Learning Center. *Metrics Made Easy: A Classroom Guide*. 1978. 44 pp. \$2.50. Order from Fordham/District 3 Learning Center, Room 1025, 113 West 60th Street, New York, NY 10023.

A classroom guide that includes an introduction to metrics: early childhood and upper grade goals and activities in weight, length, temperature, and volume; worksheets and metric games.

King, Julie. *Games and Activities for Teaching Numbers and Numerals*. 1977. 38 pp. \$1.15. Order from Philadelphia Teacher-Parent Center, Durham School, 16th and Lombard Streets, Philadelphia, PA 19146.

Collection of ideas on ways to teach rote counting, ordering, one-to-one correspondence, associating numerals with numbers, and recognizing, forming, and writing numerals. Illustrated for coloring in.

King, Julie. *A Million Twos*. 1972. 13 pp. \$1. Order from Philadelphia Teacher-Parent Center, Durham School, 16th and Lombard Streets, Philadelphia, PA 19146.

Children in a school decide to "collect" a million twos, using adding machines, reaching an average of 25,000 a day, and saving all the tapes produced. Pamphlet describes related mathematics work growing out of the project (counting, recording, estimating, measurement concepts including length and time, place value, multiplication, averaging, etc.).

Kreinberg, Nancy. *I'm Madly in Love with Electricity and Other Comments about Their Work by Women in Science and Engineering*. 1977. 37 pp. \$2. Order from Lawrence Hall of Science, University of California, Berkeley, CA 94720. Make checks payable to Regents, University of California.

"If young women were encouraged to take all the math and science courses they could . . . their options for future work and study would be many times increased." These highly readable accounts of the work women are doing in science and engineering are strong motivations for math study for girls of middle school and high school age. "In these pages you will meet a woman who is learning to produce clean energy by fusing hydrogen atoms to form helium, another who is studying the origin and evolution of galaxies, and several who are investigating the causes of disease. The field of engineering alone

offers so many career possibilities that the 18 women represented present only a glimpse of what one might do as an engineer."

Kohl Teacher Center. *From Teacher to Teacher, Math Ideas. Vol. II*. 1979. 116 pp. \$6.70. Order from Kohl Teacher Center, 415 Green Bay Road, Wilmette, IL 60091.

The book contains math ideas contributed by K-8 teacher participants in a sharing day sponsored by the Kohl Teacher Center.

Math Learning Center. POB 3364, Salem, OR 97302. All orders prepaid.

Continuum, edited by Barry Mitzman. Quarterly newsletter that provides information and ideas about ways to improve math teaching through the continuing education of teachers. 12 pp. Free.

Monographs: "School Math vs. Folk Math," by Eugene Maier. 1977. 8 pp. 50¢; "Folk Math," by Eugene Maier. 1977. 2 pp. 25¢; "Problems of Minimality," by Barry Mitzman. 1978. 8 pp. 50¢; "Women and Math," by Barry Mitzman. 1977. 8 pp. 50¢.

Books: *Calculators and Elementary Education*, by David Moursund. 1979. \$7; *Computers and Elementary Education*, by David Moursund. Forthcoming; *Are You Computer Literate?* by Karen Billings and David Moursund. 1979. 148 pp. \$8.95; *Problem Solving with Calculators*, by Karen Billings and David Moursund. 1979. \$7.95.

O'Brien, Thomas C. *Solve It! Basic Problem Solving Activities*. Books 1-5. \$5.25 per book; \$24.75 entire set. Order from Educational Teaching Aids, 159 West Kinzie, Chicago, IL 60610.

This set of five books by the director of the Teachers' Center Project at Southern Illinois University provides material to encourage fourth-through ninth-grade children to sharpen thinking skills. Numerous activities involve children in solving a problem rather than merely memorizing a formula. Some of the exercises have more than one solution and may be approached in various ways, thus promoting creative and independent work. These activities are designed so that one child, two, or a small group can meet a challenge. As students become adept at problem solving, they are encouraged to create their own puzzlers for others to solve.

Pederson, Clara A., ed. *Mathematics*. 1977. 50 pp. \$2.20 prepaid. Order from Clara A. Pederson, Box 8158, University of North Dakota, Grand Forks, ND 58202. Make checks payable to University of North Dakota.

Ideas for teaching mathematics, including diagnostic techniques, graphing activities, how to use concrete materials to develop computational skills, and description of math workshops led by Roberta Hays. Part of the Informal Education series.

Rasmussen, Lore. *Creating a Mathematics Laboratory Environment in the Elementary School: Part I: The Classroom Without Special Equipment*. 1968. 22 pp. \$1. Order from Philadelphia Teacher-Parent Center, Durham School, 16th and Lombard Streets, Philadelphia, PA 19146.

Describes mathematics laboratory activities, especially graphing projects, noting that they do not require special equipment but a particular point of view toward raising problems, asking questions, and developing problem-solving techniques.

Rasmussen, Lore. *Pondering, Puzzling, Playing: An Approach to Mathematics for the Young Child*. 1968. 19 pp. \$1. Order from Philadelphia Teacher-Parent Center, Durham School, 16th and Lombard Streets, Philadelphia, PA 19146.

Informal home and school experiences for five- to ten-year olds, which strengthen their ability to observe and analyze the world around them. Experiences with numbers, measurement, shape; comparisons and contrasts; questioning whether an answer works or a better one can be found.

Rasmussen, Peter. *Key Curriculum Project*. Order from POB 2304, Berkeley, CA 94702. If a check is enclosed with the order, publisher pays postage and handling. (California residents add sales tax.) Peter Rasmussen was formerly a staff member at the Learning Centers Project, Durham School, Philadelphia.

Miquon Math Lab Materials. Grades 1-4. Teacher's set of six books, notes, lab sheet annotations, mathematics for the primary teacher, first-grade diary. \$19.95. Cuisenaire rods for use with Miquon Materials: set of 74 wooden rods, \$5.75; set of 74 plastic rods, \$3.95.

Mathtiles. Grades 4-12. *Mathtiles Manual* (184 pp.) alone, \$9.95. Complete set includes 180 arithmetic and algebra tiles, sorting trays, display board, manual, 180 student lab sheets, and lab sheet answer book. \$99.50.

The *Mathtiles Manual* is a teacher's guide containing over 700 diagrams to direct the reader through visual and tactile experiences in arithmetic and algebra. May be purchased separately and used with mathtiles created by the classroom teacher and students.

The entire set "provides a concrete model that students of all ages can use to physically experience the operations of arithmetic and algebra." By manipulating tiles on the display board, "students can physically enact the operations of addition, subtraction, multiplication, and division of whole numbers, integers, and polynomials."

Key to Fractions. Grades 4-12. Teacher's set of four booklets and answer book. Presents new ideas in small steps, each suggested by practical examples and practice problems. \$4.10 prepaid.

Key to Geometry. Grades 4-12. Teacher's set of eight booklets, answer books, and notes, circle master compass, and plastic straightedge. Workbooks for active involvement in geometric constructions using only a compass and straightedge. Particularly manageable for students with reading difficulties. \$11.40.

Key to Algebra. Grades 5-12. Teacher's set of four booklets, answer book, and notes. A teacher-produced series of algebra text-booklets, also available in Spanish version, *Clave Para Algebra*. Easy reading level, clear and simple presentation of concepts, with handwritten examples and exercises that can be used for individualized instruction by students of all ability levels. \$4.

Schwandt, Alice Kaseberg; Kreinberg, Nancy; and Downie, Diane. *Use EQUALS to Promote the Participation of Girls in Mathematics*. 1980. \$5. Order from Lawrence Hall of Science, University of California, Berkeley, CA 94720. Make checks payable to Regents, University of California.

The handbook describes the EQUALS teacher training program, which is designed to promote sex-fair mathematics instruction and counseling, and provides methods and materials for use by educators at the elementary, secondary, and college levels. In addition, it includes an annotated bibliography on sex-fair counseling and instruction as well as one on problem solving in mathematics. The handbook can be used in classrooms as well as in preservice and inservice workshops.

Stonerod, Dave. *Friendly Games to Make and Learn*. 1976. 64 pp. \$6.70. Order from Activity Resources Company, Inc., PO Box 4875, Hayward, CA 94540.

This book is a collection of mathematical games and puzzles. Many well-known games from varied cultures have been modified for classroom use. Included are 20 gameboard pattern masters that can be reproduced, with game rules and lists of required materials for each. Dave Stonerod formerly taught in teachers' centers in Richmond and Castro Valley, CA.



Arts and Crafts

Bamberger, Jeanne, and Watt, Dan. *Making Music Count: A Teacher's Guide with Commentary*. 1979. \$3. Order from Education Development Center, Distribution Center, 55 Chapel Street, Newton, MA 02160.

Detailed descriptions and illustrations of activities designed to help children develop basic skills in music, as carried out in a series of trial classes. The activities are designed for a group of three to five children, between the ages of eight and eleven.

Deily, Lanaya. *Plastic Possibilities*. 1977. 13 pp. \$2. Order from Teacher Shelter, Oakland Unified School District, 1025 Second Avenue, Oakland, CA 94606.

Five art ideas for using scrap acrylic and polystyrene—kaleidoscope, simple printing, mobiles, stained glass, and ink etching.

Graves, Ginny. *Discovery Stuff: Twelve Months of Creative Art Ideas*. 1977. 60 pp. \$6. Order from the Learning Exchange, 2720 Walnut, Kansas City, MO 64108.

A collection of open-ended art activities designed to stimulate adult skills, as well as challenge young minds. Loosely grouped according to months and seasons, with holiday ideas. Examples include kitchen collages and maxi masks.

Langstaff, Nancy, and Sproul, Adelaide. *Exploring with Clay*. 1979. \$5.50. Order from Association for Childhood Education International, 3615 Wisconsin Avenue, NW, Washington, DC 20016.

A practical and inspiring book describing five-to-eight-year olds' work with clay in a Cambridge classroom where clay was available throughout the day for six weeks. The authors comment: "The activities were planned to follow a general pattern of experimenting with materials and ideas, then to move toward building skills and concepts. Along the way the children's curiosity carried them into areas of math and science." The children's responses are recorded in photographs and in words (from overheard conversations, dictation, and writing). For the teacher there are transcriptions of dialogue between teacher and child, a brief section of technical notes, and suggestions for related activities. Adelaide Sproul was a member of the staff of the Greater Boston Teachers' Center.

Mangum, John Atwood. *Children's Carpentry*. 1974. 76 pp. \$2.90. Order from Learning Centers Project, Durham School, 16th and Lombard Streets, Philadelphia, PA 19146.

Describes children using tools and materials in a classroom carpentry center. Defines children's carpentry as: "Children learning to use tools, learning about materials, making things meaningful to their worlds, making their daydreams and play real, learning to manipulate and control their environments, using their bodies in new ways, using their minds and hands together."

Orvell, Tamar. *Take a Handful of Letters*. Visuals by Kathleen Broderick. 1974. 69 pp. \$2. Order from Education Development Center, 55 Chapel Street, Newton, MA 02160.

Ideas for printing with commercially produced alphabets, and with letters made from erasers, inner tubes, and triwall.

Pederson, Clara A., ed. *Art*. 1976. 32 pp. \$2.20 prepaid. Order from Clara A. Pederson, Box 8158, University of North Dakota, Grand Forks, ND 58202. Make checks payable to University of North Dakota.

Six theoretical and practical articles by teachers, advisors, and students on art experiences in elementary classrooms. Part of the Informal Education series.

Pederson, Clara A., ed. *Creative Drama*. 1976. 31 pp. \$2.20 prepaid. Order from Clara A. Pederson, Box 8158, University of North Dakota, Grand Forks, ND 58202. Make checks payable to University of North Dakota.

Contains articles on pantomime, creative drama, and puppetry. Descriptions of North Dakota teachers and students involved in these arts over the past eight years. Includes an annotated bibliography. Part of the Informal Education series.

Pederson, Clara A., ed. *Movement and Playgrounds*. 1976. 65 pp. \$2.20 prepaid. Order from Clara A. Pederson, Box 8158, University of North Dakota, Grand Forks, ND 58202. Make checks payable to University of North Dakota.

An interesting and practical compilation of movement activities, lesson plans, philosophies, and bibliographies, as well as unusual ideas for how to arrange and design low-cost playground equipment. Part of the Informal Education series.

Sickman, Sallye. *Creative Dramatics*. 1977. 30 pp. \$6.75. Order from the Learning Exchange, 2720 Walnut, Kansas City, MO 64108.

A guide to encouraging creative energy and self-esteem through dramatics. Includes teaching suggestions, projects, and background philosophy. Activities are included in "Beginning Improvisations," "A Ghost Story with Special Effects," "Getting in the Last Word," "Becoming Machines."

Steel, William. *I Do and I Understand*. 26 pp. 50¢. Order from Curriculum Workshop, Catamount School, School Street, Bennington, VT 05201.

The first part of the booklet describes the curriculum development project in an effective question and answer format. The second part is a booklet about manipulative skills and using tools with children.

Workshop for Learning Things, 5 Bridge Street, Watertown, MA 02172.

Bookmaking Instruction Kit. Posters provide detailed instructions for making a sewn binding, a Japanese binding, and a "circle book." Kit includes simple tools and materials (clothes pins, glue stick, needle, nail, tongue depressor, and an assortment of papers and yarn) for making five books. 1975. \$9.95 for three posters, tools, and paper; \$5.95 for posters only.

Camera Cookbook. A "recipe book" for teachers on the art of using cameras in the classroom. All the instructions, formulas for mixing chemicals, and helpful hints necessary for students to produce finished pictures using simple cameras. 1971. \$4.95.

It's So Simple: Click and Print. An illustrated guide to classroom photography written by sixth-grade students and workshop staff. "All the information you need for picture taking, film developing, and printing—as described by a class that did it all." 1970. \$3.95.

Label Press. How-to suggestions for printing with label presses (stamping machines that extrude a strip of colored plastic with raised letters). Written by sixth graders who invented many of the procedures they describe. 1969. \$1.95.



Science

Burns, Marilyn. *Good For Me! All About Food in 32 Bites*. 1978. 128 pp. \$7.95 (\$4.95 paper). Order from Little Brown and Co., 200 West Street, Waltham, MA 02154.

"Food is a crucial part of our daily lives, but how much do we know about what it contains, what our bodies do with it, and what it does for us? Written in an informal style embellished with drawings and activities, this book is intended to help anyone who browses through it understand more about that important element in our lives—food."

Dropkin, Ruth, ed. *Science in the Open Classroom*. 1974. 54 pp. \$1.50. Order from Workshop Center for Open Education, 6 Shepard Hall, 140th Street and Convent Avenue, New York, NY 10031.

Includes theoretical articles on elementary science by Lillian Weber, Nathan Isaacs, Eleanor Duckworth and others, as well as examples of classroom science projects with commentary by teachers and Workshop Center staff. Also, a resource list of programs, books, magazines. The emphasis is on cultivating the spirit and skills of inquiry.

Elementary Science Study. *The ESS Reader*. 1970. 236 pp. \$2.50. Order from Education Development Center, Inc. 55 Chapel Street, Newton, MA 02160.

The Elementary Science Study was the seedbed from which several teachers' centers have sprouted and many more have taken inspiration and curriculum. This collection of papers, written by ESS staff in the 1960s, offers an encounter with some of the ideas at the heart of teachers' center practice. Here are essays by David Hawkins ("Messing About in Science," "I, Thou, It," "On Living in Trees"), Philip Morison ("The Curricular Triangle and Its Style," "Experimenters in the Schoolroom"), George Hein, Eleanor Duckworth, William Hull, Posie Churchill, and others.

Elementary Science Study. *A Materials Book for the Elementary Science Study*. 1972. 68 pp. \$3.75. Order from Education Development Center, Inc., 55 Chapel Street, Newton, MA 02160.

A discussion and examination of alternative ways to collect and maintain science materials; invaluable for users of ESS, and helpful to any elementary science teacher.

Hawkins, Frances Pockman. *The Logic of Action: From a Teacher's Notebook*. 1969. 148 pp. \$2.95. Order from Mountain View Center for Environmental Education, Campus Box 472, University of Colorado, Boulder, CO 80309.

An account of the author's work teaching six deaf four-year-olds, using early childhood science activities. "The account . . . is one of manifold encounters with a planned but unprogrammed environment, and of their choices within it." Valuable not only for teachers of the deaf, this book demonstrates the

power of action with natural materials for enriching the cognitive development of young children. Hawkins is one of the founders of the Mountain View Center for Environmental Education.

Paull, Dorothy and John. *Yesterday I Found...* 1972. 70 pp. Single copies free. Order from Mountain View Center for Environmental Education, Campus Box 472, University of Colorado, Boulder, CO 80309.

A British teacher's account of two years' work with a class of nine- through eleven-year-olds in Leicestershire emphasizing the investigation of natural materials—rocks, shells, animals, bones—both in the classroom and on field trips. Thoughtful descriptions of what Dorothy Paull did, how the children reacted, and what they learned, interspersed with comments about the quality of children's learning and reasons for the effectiveness of her methods.

Pederson, Clara A., ed. *Science*. 1977. 80 pp. \$2.20 prepaid. Order from Clara A. Pederson, Box 8158, University of North Dakota, Grand Forks, ND 58202. Make checks payable to University of North Dakota.

Descriptions, written by classroom teachers, of science activities for elementary students. Includes nutrition, rocks, and plants. Part of the Informal Education series.

Schuylkill Valley Nature Center. *Curriculum Packs*. Packets \$1 each plus 75¢ postage and handling. Order from Sallie Welte, Schuylkill Valley Nature Center, 8480 Hogy's Mill Road, Philadelphia, PA 19128.

Suggested activities on biological themes for teachers to use in and around their schools. Titles currently available are "Energy Flow and Materials Cycle" (Grades 3-6); "Communities" (Grades N-2 or 3-6); "Adaptations and Populations" (Grades N-2 or 3-6); "Abiotic Factors" (Grades N-2 or 3-6).



Social Studies

Ackerly, Sally. *Economics in Action: Lesson Ideas for the Primary Grades*. 1977. 118 pp. \$5. Order from the Learning Exchange, 2720 Walnut, Kansas City, MO 64108.

This lesson guide for working with young consumers is one result of a teachers' center course with follow-up classroom support that enabled 50 primary grade teachers to try new teaching methods and curriculum in economics education. "The teachers learned that economics involved learning experiences that could be integrated throughout a school day."

Ackerly, Sally, and Riekes, Linda. *Law in Action Series*. A student edition (\$4.75) and a teacher's manual (\$4.75) are available for each of the books listed below. Discounts on orders of 25 or more. Order from Trudy Faust, Law in Action National Coordinator, 393 North Euclid, St. Louis, MO 63108.

Geared to a reading level of fifth and sixth grade and organized around activity-oriented lessons, the *Law in Action Series* includes photographs and drawings. One of the authors, Sally Ackerly, works with the Kansas City Learning Exchange.

Juvenile Problems and Law. Intended to help students learn to take responsibility for solving their own problems and to think ahead to the consequences of their actions; another goal of the book is to tell the story of the juvenile court.

Courts and Trials. Lessons on the history of the court system, differences between civil and criminal law, and powers ascribed to different courts. Also described are job responsibilities of people who work in the judicial system.

Young Consumers. This book attempts to answer the questions, "Who is a consumer? How does one acquire consumer skills? What are the responsibilities of the seller, the buyer, of government agencies charged with protecting consumers?" Includes the history of the Food and Drug Administration.

Lawmaking. Lessons examine the need for laws and for citizen participation in the lawmaking process. The text encourages analysis of constitutional rights in conflict.

Authority, Law and Responsibility. This book is intended to help students understand the concept of authority and various types of authority figures including parents, police, and school personnel.

Boston Children's Museum. *Centre St.: An Exhibit and Fair*. 1975. 64 pp. \$3.25 (Massachusetts residents add sales tax). Order from Museum Shop, Children's Museum, 300 Congress Street, Boston, MA 02110.

This book tells the story of a children's museum exhibit that grew into a street fair involving the people and establishments along three city storefront

blocks. Members of the Centre St. Community in Jamaica Plain, MA, contributed to the book.

Burns, Marilyn. *I Am Not a Short Adult: Getting Good at Being a Kid*. 1977. 125 pp. \$7.95 (\$4.95 paper). Order from Little Brown and Co., 200 West Street, Waltham, MA 02154.

Another Brown Paper School book, this contains engaging discussion, cartoons, and activities that illuminate the child's relationship to adult society: legal status of children in society, in school, in families, as workers; children as consumers, as television watchers and movie-goers. Convincing advice on how to communicate with grown-ups. This is a trade book that could explicate and enliven many social studies discussions at upper elementary and middle school levels.

Chambers, Sarah; Balne, Jamie; Smith, Susan. *Vermont Teachers' Resource Directory*. 1979. 218 pp. \$4.50. Order from Washington West Resource Center, Old Post Office, RFD 1, Box 172N, Waitsfield, VT 05673.

"This is a directory of community resources and inservice opportunities for Central Vermont teachers at the elementary and secondary school levels (which teachers' centers might adapt in designing local resource files). The resource section includes Central Vermont people who are willing to share their knowledge through workshops, lectures, or demonstrations. Also listed in this section are community sites for school groups to visit on field trips. The second part lists counseling and social service organizations that aid students with individual problems. The final portion of the *Directory* is the inservice section, listing programs and new practices in education located in Vermont and, in some cases, neighboring states. The *Directory* has been written in response to needs and suggestions expressed by Central Vermont teachers and administrators—many of whom conducted the search for resources in the individual communities."

Community Studies, Inc. *Vietnam Orphans*. 1975. 18 pp. \$1. Order from Community Studies, Inc., 670 West End Avenue, New York, NY 10025.

Reprints of newspaper articles, political cartoons, and other reports about Vietnam orphans. Useful for high school social studies or journalism classes.

Cook, Ann; Gittell, Marilyn; Mack, Herb. *What Was It Like When Your Grandparents Were Your Age?* 1976. 96 pp. \$3.95. Order from Pantheon Books, 201 East 50th Street, New York, NY 10022.

Photographs, advertisements, menus, catalogues, and newspapers with commentary and questions, providing a visual record of the 1920s and '30s. Inspiration for students to explore their own family history. Cook and Mack were directors of the Community Resources Institute, a teachers' center (now closed) located first in Manhattan, later in Brooklyn.

Fielder, Erica, and Schaffer, Carolyn. *Ecology for City Kids*. April 1979. 56 pp. \$3.50. Order from San Francisco Ecology Center, 13 Columbus Avenue, San Francisco, CA 94111.

K-12 curriculum of city-based nature studies, treasure hunts, rainy day games, art projects, daypack instructions, street corner surveys, etc. For parents, librarians, childcare workers, camp counselors, church and scout group leaders, as well as classroom teachers.

Fordham/District 3 Learning Center. "Manhattan in Miniature Units: An Interdisciplinary Approach to Social Studies." 1975-76. 12-15 pp. each. \$2.85/unit. Order from Fordham/District 3 Learning Center, Room 1024, 113 West 60th Street, New York, NY 10023.

Four flexible units—"Neighborhood," "Architecture," "Transportation," and "History"—providing 8-10 week activities that can be modified for 3rd-8th grade levels. These units were developed for use in the Center's "resource room" with a schoolroom size floor map of Manhattan, but many of the activities can be done without the map. Each unit contains curriculum concepts, pre-resource room activities, resource room activities, classroom activities, ongoing enrichment activities, and a bibliography. Although the units were developed for teachers and students in Manhattan, teachers could modify them for use in other communities.

Gjelten, Tom. *Schooling in Isolated Communities*. 1978. 101 pp. \$6. Order from North Haven Project, Box 13, Portland, ME 04112.

The story of a federal project for career development in a small, isolated school on North Haven Island, ME. Of interest to teachers' centers serving rural areas.

Little Wound Teacher Center, Little Wound School, Pine Ridge Reservation, Kyle, SD 57752.

Booklets of traditional Native American stories by Charles Under Baggage, illustrated by Richard Under Baggage. "Iktomi and Iya," "How the Duck Got Red Eyes," "Iktomi and the Beavers," and "Iktomi and the Insane Bear." \$2.25 for four pamphlets.

A Story Teller's Handbook: A Collection of Tales from the Pine Ridge Reservation. More Iktomi stories. \$1.

The Mustang News. Put out by student reporters from Little Wound School. Local school news, poetry, photographs.

Geneology in the Secondary American Indian Classroom, by Lyman Brenner. A Little Wound Teacher Center IDEA Paper.

Ehani Club Bulletin. (Ehani is "long ago.") A booklet of stories from senior members of the Pine Ridge Reservation, who come together for a story teller's club.

Upside Down & Sideways. A book of unedited essays by high school students at Little Wound School. Collected by the language arts teacher, Kim Rogal, who says, "The book is a mirror that reflects the minds of Kyle teenagers. Some are rebels without a cause, some preachers, some observers, some clowns."

Minturn, Mary, and Cole, Judy. *A Pioneer Workshop.* 1975. 112 pp. \$6.50. Order from the Learning Exchange, 2720 Walnut, Kansas City, MO 64108.

An idea and how-to-do-it book that uses pioneer crafts, toys, games, cooking, and holiday activities to study early American life.

Murrow, Casey, ed. *Using Our Communities.* 1977. 63 pp. \$3. Order from Mountain Towns' Teacher Center, Deerfield Valley Elementary School, Wilmington, VT 05363.

Descriptions of community studies activities by the teachers who directed them. Sections include: local history, media, natural science, food, agriculture and forestry, mapping, technology, government and social services, student businesses, community service projects, physical education, and health. Thoughtful comments are included on field trip experiences, record keeping, gaining local support, the relation to children's writing, techniques for interviewing and observing, shadowing people, and tying community studies to the regular curriculum.

Paradise, Muffy; Mosher, Ralph; Lickona, Tom. *Democratic Classrooms Theory and Practice: A Teachers Curriculum Project.* 1979. 25 pp. \$1. Order from Teacher Center Brookline, 88 Harvard Street, Brookline, MA 02146.

"What does it mean to do democracy with children? This monograph describes a project of the Teacher Center Brookline and Boston University to clarify the meanings of democratic education in the elementary classroom and school. It is divided into five sections:

1. A statement of the theoretical principles that have guided the Project's approach to its task.
2. An account of the seminars and workshops held with the two groups of Project participants.
3. A description of procedures used to document and evaluate the growth of participants.
4. A report of dissemination, wider impact, and related developments in democratic education within the Brookline Public Schools.
5. Plans for the third year of the Project."

Pederson, Clara A., ed. *Social Studies.* 1976. 52 pp. \$2.20 prepaid. Order from Clara A. Pederson, Box 8158, University of North Dakota, Grand Forks, ND 58202. Make checks payable to University of North Dakota.

Brief papers on various aspects of teaching social studies, prepared by teachers, staff, and consultants of the Center for Teaching and Learning. Compiled over the past eight years, and part of the Informal Education series.

Teachers' Learning Center. *Global Perspectives Experimental Units.* \$3 each. Order from Teachers' Learning Center, 712 Girard, NE, Albuquerque, NM 87106.

A Hero Ain't Nothing But a Great Big Sandwich, by Linda Fowler, Jan Glover, and Julia Gore. This unit focuses on students and their views of what a hero is. It asks students to answer questions that relate to their perceptions about real and imaginary heroes.

20 Activities to Expand Your Students' Knowledge of the World While Studying Your State, by Alice Ann Cleaveland and Nancy G. Lewis. Activities include "Geographical Features: How Many Can Be Found in Your State?" "Restaurants and Their Specialties," "Conflict in the News."

Forthcoming Global Perspective Units are *Do You Have to—* to and *Language and Culture*, also \$3.



About Learning

Carini, Patricia F. *The Art of Seeing and the Visibility of the Person.* 1979. 81 pp. \$4 prepaid. Order from North Dakota Study Group, University of North Dakota, Grand Forks, ND 58202.

Philosophical underpinnings of Carini's phenomenological methods for observing children in their natural work and play and for viewing their paintings, crafts, and writing, so as to gather over time an archive of observations on which to reflect about and

understand each child's unique learning themes, style, motifs. Carini's methods, developed and taught at Prospect Center, North Bennington, VT, are the basis for teachers' study groups at a number of teachers' centers.

Carini, Patricia. *Prospect Papers: Considerations of The Lifespan*. 1979. \$3.50. Order from Prospect Archive and Center for Education and Research, North Bennington, VT 05257.

The *Prospect Papers* present both the staff's research and practice and the work of colleagues. The articles focus on field-based research, classroom practice, and staff development programs that involve the Prospect documentary processes and philosophical thought.

Center for Teaching and Learning. *Staff Development Workbook for Classroom Teachers and Principals*. 1976. 41 pp. \$1 prepaid. Order from and make checks payable to North Dakota Study Group on Evaluation, Box 8158, University of North Dakota, Grand Forks, ND 58202.

A well-designed workbook with space for the user's comments and reflections, and with suggestions on topics such as planning, sharing, trust, growth, and conflict. Includes provocative quotations; suggested self-directed activities for a teacher to monitor her own teaching, attack a problem, or get organized; and extensive teacher/child interviews and ways to use these interviews to help teachers and parents evaluate classrooms.

Churchill, Edith H. E., and Petner, Joseph. *Children's Language and Thinking: A Report of Work-in-Progress*. 1977. 60 pp. \$2.50 prepaid. Order from and make checks payable to North Dakota Study Group on Evaluation, Box 8158, University of North Dakota, Grand Forks, ND 58202.

This report describes the taping of vignettes of children's classroom conversations by in-school advisors. The typed transcripts were given to teachers taking part in a semester-long inservice course, and were used for staff discussions focussing on the individual teacher's classroom—on each child's developmental levels, learning styles, strengths, and interests, and on implications for the curriculum.

This monograph and a report by Churchill and Richard C. Carter about a similar project at Hanscom School (Lincoln, MA), provide a model that teachers' centers or advisors can use to design "Children's Conversation Workshops" as staff development experiences for teachers. The goal of the workshops, like that of all advising, is to stimulate teachers' thinking, not only about particular problems, but about teaching in general.

Delano, Georgia. *Bronson Alcott and Henry David Thoreau: 19th Century Pioneers in Open Education*. 1978. 20 pp. \$1. Order from Workshop Center for Open Education, 6 Shepard Hall, City College, 140th Street and Convent Avenue, New York, NY 10031.

A monograph documenting the advanced ideas about schools and children held by two famous Americans.

Drew, Walter F.; Olds, Anita R.; Olds, Henry F., Jr., *Motivating Today's Students*. Learning Handbooks. 1977. 93 pp. \$5.45 prepaid. Order from Pitman Learning Inc., 6 Davis Drive, Belmont, CA 94002.

Starting from the premise that disaffected, disinterested students can be reached, the authors ask teachers to look at all students in their classrooms—not only the ones they have identified as "unmotivated." Avoiding "sure-fire cures," the authors present six Massachusetts classrooms, K-6, and ideas and activities teachers from those classrooms have used to develop motivation in children.

Dropkin, Ruth, ed. *The Teacher as Learner*. 1977. 58 pp. \$3.50. Order from Workshop Center for Open Education, 6 Shepard Hall, City College, 140th Street and Convent Avenue, New York, NY 10031.

Selection of teachers' work at WCOE summer institutes, plus essays and discussion by institute staff. The summer institute, with its three weeks of uninterrupted focus on a single project for the participants' own learning—not for the classroom—"is part and parcel of our effort to foster active learning and to create an ambience that encourages such learning. What participants most appreciate about summer institutes, they tell us, is the time given over to awareness of their own learning process, time to overcome the fear of failure, time to live through the embarrassment of exposing the possibly primitive level of their understanding of whatever it is they've embarked upon."

Dropkin, Ruth, and Tobier, Arthur, eds. *Roots of Open Education in America*. 1976. 201 pp. \$5. Order from Workshop Center for Open Education, 6 Shepard Hall, City College, 140th Street and Convent Avenue, New York, NY 10031.

Proceedings of the April 1975 conference at the Workshop Center for Open Education, directed by Lillian Weber. Among the speeches are Vito Perrone's "A View of School Reform," tracing informal reforms in this country since 1840; Paul Nash's "Some Economic Questions," postulating that the chief enemy of informal education is the fear and often obsessive concern for setting boundaries and

controlling people that result from economic hard times; and Joseph Featherstone's "Dewey's Synthesis: Science and Feeling," in which he stresses that Dewey moved from progressivism's concern for science and rationalism to a concern for a balance of science and feeling in education.

But the majority of the book consists of reminiscences by leaders of important educational experiments and experiences of the past: the one-room rural school, the New York Yiddish schule, the settlement house, Highlander Folk School, Citizenship Education Movement of the South, inspiring the civil rights movement. Myles Horton's description of how Highlander fostered the Citizenship Education Program is of interest to anyone with a mind to start a teachers' center: "People always draw up grand detailed plans; they make all kinds of analyses. Well, that's a good way not to do anything. If you really are serious, then you do just one thing, do it well, and let it spread on its merits. And if it can't spread on its merits, it's never going to spread . . . If the people don't want to peddle it, it's no good." (p. 113)

Duckworth, Eleanor. *The African Primary Science Program: An Evaluation and Extended Thoughts*. 1978. 135 pp. \$5.50 prepaid. Order from and make checks payable to North Dakota Study Group on Evaluation, Box 8158, University of North Dakota, Grand Forks, ND 58202.

Although written as a research report on the African Primary Science Program, this monograph also serves to alert readers to the importance of demystifying evaluation so that researchers are guided as much by the approach to evaluation as by the potential findings. The study demonstrates significant differences in performance on Piagetian tasks between children exposed to experiential elementary science curriculum based on the principles of informal education and children in the conventionally-schooled control group that remained faithful to the educational premises underlying the program. Duckworth's alternative evaluation strategies could be used by teachers' centers studying participants' involvement in and use of the center's learning experiences.

Duckworth, Eleanor. *Learning with Breadth and Depth*. 1979. 30 pp. \$2.50. Order from Workshop Center for Open Education, 6 Shepard Hall, City College, 140th Street and Convent Avenue, New York, NY 10031.

In this short essay Duckworth deals with what Piaget refers to as "the American question": "If ideas develop on their own so slowly, what can we do to speed them up?" Her answer is that we can and should do nothing. Rather, by describing several ex-

ploratory workshops with teachers, she shows us "how learning with breadth and depth is a different matter from learning with speed"—and a better strategy. Breadth means "the widely different spheres of experience that can be related to one another," and depth means "the many different kinds of connections that can be made among different facts of our experience." Duckworth says that teachers need to "undo rapid assumptions of understanding, to slow down closure in the interests of breadth and depth, which attach our knowledge to the world in which we are called upon to use it." The essay is taken from a public lecture at the Workshop Center in honor of one of its first advisors, the late Catherine Molony.

Engel, Brenda S. *Informal Evaluation*. 1977. 126 pp. \$2.50 prepaid. Order from and make checks payable to North Dakota Study Group on Evaluation, Box 8158, University of North Dakota, Grand Forks, ND 58202.

The purpose of this monograph "is to suggest some specific, practical evaluative methods for people without special knowledge or expertise in evaluation who are concerned with elementary education." The author states that it is her intent first to "establish a general framework for understanding the subject (evaluation), and then to discuss some ways of actually evaluating the conduct of an institution—or classrooms or the quality of a child's school experience—in terms that are generally understandable." Sections are included on "Evaluating the Child," "Evaluating the Classroom," and "Evaluating the Program/The Institution."

Field, Kristin. *Teacher Development: A Study of the Stages in Development of Teachers*. 1979. 30 pp. \$1. Order from Teacher Center Brookline, 88 Harvard Street, Brookline, MA 02146.

One of several occasional papers published by Teacher Center Brookline to encourage and enable teachers to write about their work. Kristin Field writes: "How does the teacher eventually develop the complex of skills called teaching? I sought answers to this through interviews with teachers and found three identifiable stages: the first is characterized by day-to-day survival, hit-or-miss solutions to problems, and intense feelings of inadequacy. Stage two is notably different in that increased self-confidence encourages the teacher's feelings of worth, success provides her/him with some appropriate and reliable solutions to problems and she/he has extended the boundaries of her/his planning beyond one day and into weeks. At stage three, the teacher is a whole person, children are real individuals, and learning is approached as a whole process, rather than divided up either by time or by sub-

ject. . . . The descriptions (of stages) are meant to serve as a continuum for identifying approximately where one is and where one is going. In addition, they are meant to provoke a sense of community for the teacher who often feels very much alone."

Gray, Lynn. *Peer Teaching Handbook: How to Help Your Students Help Each Other*. 1978. 18 pp. \$2.50. Order from Pittsburgh Peer Teaching Project, 5501 Fair Oaks Street, Pittsburgh, PA 15217.

"This manual gives precise directions for arranging peer teaching opportunities that are helpful to the teacher and beneficial to both the teacher and the learning student. The manual covers:

- Specific directions for 21 activities to promote peer teaching
- Same-age teaching within a classroom
- Cross-age teaching within a school
- Objectives, content and examples of creative methods for initial and on-going training of peer teachers
- Classroom management techniques to insure successful implementation
- A duplicatable instruction sheet of games to be made by students for use in peer teaching
- Academic and social gains verified by research conducted under foundation grants."

Hawkins, David. *The Informed Vision: Essays on Learning and Human Nature*. 1974. 246 pp. \$8.95. Order from Agathon Press, 15 East 26th Street, New York, NY 10010.

David Hawkins was the first director of the Elementary Science Study, one of the American curriculum development projects that was a precursor of teachers' centers. He is now the director of the Mountain View Center for Environmental Education at the University of Colorado, Boulder, one of the earliest and most influential teachers' centers. As a pioneering curriculum developer, as a philosopher of science with a deep curiosity and enthusiasm for the learning of young children, and as a major interpreter of the work of John Dewey, Hawkins has spoken and written extensively in the past 15 years on the most critical issues in American education. Many of these works are gathered here with "guiding threads" and modification in a commentary by Hawkins.

Hot Springs Teacher Center, 111 Spring Street, Hot Springs, AR 71901.

Handbook for New Teachers. A booklet for new teachers in the Hot Springs School District. Provides a map with locations of all schools and vital information about each school. It can serve as an example to other teachers' centers wanting to make a

booklet for new teachers in the districts they serve. 1979. \$1.50.

Substitute Teaching. Although this handbook is intended for the Hot Springs School District, it can serve as a model for other teachers' centers developing handbooks for substitute teachers. It discusses qualifications for substitutes, discipline, lesson plans, and includes school phone numbers and the district's school calendar. 1979. 22 pp. \$1.

Hull, Bill. *Teachers' Seminars on Children's Thinking: A Progress Report*. 1978. 58 pp. \$2.50 prepaid. Order from and make checks payable to North Dakota Study Group on Evaluation, Box 8158, University of North Dakota, Grand Forks, ND 58202.

"Some educators have . . . wondered whether teachers' observations might not be a better source of knowledge about how children think than laboratory experiments." (Magdalene Lampert Cowley, *Harvard Educational Review*, August 1979). This monograph describes seminars in which teachers share and reflect upon their observations, becoming researchers into their students' thinking process and relying upon their own experience as a source of understanding. An excellent model for "study groups" of all kinds, the report includes documentation of the seminar and written notes and commentary.

Jervis, Kathe. *Children's Thinking in the Classroom*. 1978. 57 pp. \$2.50. Order from and make checks payable to North Dakota Study Group on Evaluation, Box 8158, University of North Dakota, Grand Forks, ND 58202.

A provocative account of the effect on a teacher's work of her participation in an ongoing children's thinking seminar. The writer examines basic questions about the nature of teaching, about how one learns to teach, and about teachers' engagement in a high level of problem solving in their daily interactions with children.

Jordon, Sue. *Volunteer Handbook*. 16 pp. Free. Order from Boise School Volunteers, 1207 Fort Street, Boise, ID 83702.

A booklet written for citizens volunteering their time in schools as tutors, teacher aides, community resource guides, or special project teachers. These roles and a variety of activities are described with comments and suggestions by both volunteers and teachers.

Katz, Lilian G. *Helping Others Learn to Teach*. 1979. 39 pp. \$2. Order from ERIC Clearinghouse on Elementary and Early Childhood Education, College of Education, University of Illinois, Urbana, IL 61801.

Written for inservice specialists working with early childhood teachers, this small manual would be invaluable to teachers' center staff members working with all kinds of teachers. Katz offers "Principles for the Selection of Focus"—choosing what to work on with teachers—and "General Techniques for Working with Teachers." Among the principles are "focus on the teacher's understandings of her own situation," "on competencies already acquired," "on strengthening worthwhile dispositions," and "on providing moderate amounts of inspiration." Katz' recommended techniques include: "cultivate the habit of suspending judgment on what you observe"; "phrase suggestions in experimental form"; "help the teacher re-define her job so that it is achievable"; and "use demonstration of skills cautiously."

Olson, Ruth Anne. *What's Going On Here: Internal Evaluation Techniques for Teachers*. 1976. 34 pp. \$1.50. Order from Minneapolis Public Schools/University of Minnesota Teacher Center, 155 Peik Hall, 159 Pillsbury Drive, SE, University of Minnesota, Minneapolis, MN 55455.

This booklet, part of a multimedia project at Marcy Open School, suggests kinds of information useful to teachers in making decisions about classrooms, schedules, or their roles as teachers, and suggests ways of collecting and utilizing such information. Covers activity flow charts, activity grids, observations of space use, teacher observations, child interviews, parent questionnaires, staff meetings.

Pederson, Clara A., ed. *Evaluation and Record Keeping*. 1977. 80 pp. \$2.20 prepaid. Order from Clara A. Pederson, Box 8158, University of North Dakota, Grand Forks, ND 58202. Make checks payable to University of North Dakota.

Describes various ways of collecting information in the classroom, both for teachers' records and for children's. Describes how to use a class newspaper for shared record keeping, and how to record parent conferences. Written by classroom teachers and Center for Teaching and Learning staff, it is part of the Informal Education series.

Perrone, Vito, et al. *Two Elementary Classrooms: Views from Teachers, Children, and Parents*. 1977. 78 pp. \$3.95. Order from Kendall/Hunt Publishing Co., 2460 Kerper Boulevard, Dubuque, IA 52001.

One audience for this book from the University of North Dakota Center for Teaching and Learning is inservice and preservice teachers preparing to make their classrooms less formal and more responsive to individual children. The book provides "source material rooted in real classrooms," as well as a format for reflection and analysis of a teacher's work. The

views presented are transcriptions of in-depth interviews with teachers who had participated in the University of North Dakota master's degree internship program in informal education. One view is of the second-grade classroom of a teacher in her 20th year of teaching; the other of a second-year teacher teaching fifth-grade. Following each transcription are summaries of the interviews conducted with 12 children and then with 12 parents from each teacher's classroom.

Another audience for this book may be school people who want to evaluate the effects of a staff development program on teachers. The Teacher Interview covers the following aspects of a teacher's work: teachers' goals for children's learning; structure of the day; organization of the classroom and its materials; selection of learning topics and materials; discipline; teacher-child relationships; children's peer relationships; teacher-parent relationships; teachers' use of the community for learning; teacher's feelings, frustrations, and successes.

Rudman, Masha Kabakow. "Meeting Special Needs in the Regular Classroom..." *Writings in Reading and Language Arts*. Ginn Occasional Paper No. 4. 1980. 7 pp. Free. Order from Ginn and Company, P.O. Box 2649, Columbus, OH 43216.

A seven-page booklet of tips on running a "mainstreamed" classroom, based on the proposition that children learn by being helped to build on their strengths, and that "diagnosis should be conducted privately, but instruction should not." Rudman is co-director of the Integrated Day Program at the University of Massachusetts, Amherst.

Teacher Shelter. *Curriculum Task Cards for Documenting Student Progress*. Packet of cards and teacher's manual: kindergarden—\$8.50; for each grade 1-8—\$11. Order from Teacher Shelter, Oakland Unified School District, 1025 Second Avenue, Oakland, CA 94606.

This packet of documentation activities was selected and designed by a group of teachers working at the Oakland Teacher Shelter during the summers of 1979 and 1980 with staff members from the Teacher Shelter and the Research Department of the Oakland Unified School District. It was prepared in response to state requirements for early assessment of mathematics and language arts proficiencies and a new school board policy concerning retention and promotion. A cross section of district teachers identified key learning expectations for each level; then activities were designed using existing materials and typical classroom procedures through which these key expectations could be assessed and documented. Central to these activities is a collection of each student's work and teacher ob-

servations of student performance. These task cards, rather than standardized tests, are used to determine students' promotion or retention and classes' attainment of district proficiency levels.

Tobier, Arthur, ed. *Evaluation Reconsidered*. 1973. 78 pp. \$2. Order from Workshop Center for Open Education, 6 Shepard Hall, City College, 140th Street and Convent Avenue, New York, NY 10031.

Samples of methods, involving teachers' guide for diagnosis and assessment of reading skills, grades 1-2. "A position paper and supporting documents on evaluating change and changing evaluation." Discussion of alternative evaluation methods, including examples and samples. Contributions by Carini, Perrone, James, and others.

Watt, Molly. *Thinking About Thinking. A Description of a Seminar for Supporting Teachers Growth*. 1979. 15 pp. \$1. Order from Teacher Center Brookline, 88 Harvard Street, Brookline, MA 02146.

Description of a weekly seminar or study group of classroom teachers interested in exploring children's thinking. Includes the structure and the ground rules of the meetings and a sample discussion. One of several occasional papers published by Teacher Center Brookline to encourage and enable teachers to write about their work.

Watts, Heidi. *Starting Out, Moving On, Running Ahead or How the Teachers' Center Can Attend to Stages in Teachers' Development*. 1980. Occasional Paper No. 8. Free. Order from Teachers' Centers Exchange, Far West Laboratory for Educational Research and Development, 1855 Folsom Street, San Francisco, CA 94103.

Describing the pattern of development of a teacher, Watts characterizes a beginning stage of "survival," a middle stage of "competence and comfort," and a final stage of "mastery," which needs to incorporate activity for renewal. From her experience as a teacher, teacher of teachers, and teachers' center director, Watts tells how teachers' centers can assist teachers in all three stages. She is director of the Grassroots Teacher Center, Cortland, NY, and formerly was director at Mountain Towns' Teacher Center, Wilmington, VT.

Workshop Center for Open Education. *Recollections of a One-Room Schoolhouse: An Interview with Marian Brooks*. 1975. 20 pp. 75¢. Order from Workshop Center for Open Education, 6 Shepard Hall, City College, 140th Street and Convent Avenue, New York, NY 10031.

An interview with Marian Brooks about her early experiences teaching in two rural schools in New

Hampshire, beginning at age 15 in 1924. Her confidence in her students as learners and her commitment to a curriculum based on children's interests and their local community are emphasized.



About Teachers' Centers

Alberty, Beth. *G.A.M.E. Documentation*. 1977. 210 pp. \$5. Order from G.A.M.E., 314 West 54th Street, New York, NY 10019.

A history of G.A.M.E.'s arts-in-education program and an evaluation drawn from staff and teacher records; children's work, diaries, interviews; observations; photographs. Provides an account of an arts-integrated curriculum developed by teachers and children in New York City public schools.

Alberty, Beth, and Dropkin, Ruth. *The Open Education Advisor*. 1975. 92 pp. \$3.50. Order from Workshop Center for Open Education, 6 Shepard Hall, City College, 140th Street and Convent Avenue, New York, NY 10031.

The work life of an advisor (resource teacher or helping teacher) is described in this booklet compiled from interviews with advisors and selections from their journals. Although these advisors were associated with a project assisting teachers to improve their open classrooms, the principles of advisory work are applicable to teachers in all kinds of classrooms. This book illustrates both the principles and practice of providing practical, non-evaluative, professionally stimulating, in-classroom help, at the teacher's request. It contains a running commentary by Lillian Weber, director of Open Corridors in District 3, New York City, and of the Workshop Center for Open Education at City College of New York.

American Federation of Teachers. *Teacher Centers: Putting the Pieces Together for Success*. 1980. Looseleaf format. Single copies free. Order from AFT Teacher Center Resource Exchange, 11 Dupont Circle, NW, Washington, DC 20036.

A guidebook for teachers planning a teacher center, prepared by Patricia Weiler, director of the AFT Teacher Center Resource Exchange (funded by NIE). Sections are presented on searching for project ideas (including the role of the AFT); planning a proposal; composition and selection of the policy board; needs assessment; evaluation; staffing; budget.

Other titles from the AFT Teacher Center Resource Exchange are:

The How to Series. 1979. Looseleaf. This series is put together by Pat Weiler and 11 teacher center leaders from around the country. *How to Conduct a Teacher Center Talent Search* is a description of hiring procedures developed by teacher center policy boards. Sections include sample job descriptions and job applications, forming a personnel committee, and the interview process. Other titles in the series are *How to Develop Teacher Center Management Techniques*; *How to Organize a Teacher Center Needs Assessment*; *How to Challenge the Bionic Teacher and Generate Six Million New Ideas*; *How to Open Your Teacher Center Doors*; *How to Be a Teacher Author*.

AFT Focus: NYSUT Teacher Centers. Describes teachers' centers in New York State associated with the NYSUT, and a conference held in June 1978.

Teachers' Centers Annotated Bibliography, by Pat Weiler. A carefully annotated bibliography of books and articles from 1974 to early 1978 on teachers' center work and issues.

Apelman, Maja, et al. *Teacher Centers and Advisory Work: A Panel Discussion*. 1978. 26 pp. Single copies free. Order from National Education Association, Instruction and Professional Development, Room 709, 1201 16th Street, NW, Washington, DC 20036.

Panel discussion by Maja Apelman and five teachers who talk about how and why they got involved with the Mountain View Center, Boulder; what their initial feelings were about having an advisor in their classroom; how their relationship with the center and its staff evolved; and what effects the center has had on their outlook and practice. Apelman notes that work in the schools and work at the center are interdependent for herself, as well as for the teachers she assists. Her comments cover such topics as the problems that come up in advising, the qualifications of an advisor, how an advisory relationship is initiated, and the importance of administrative support.

Bograd, Harriet. *Is There Life After Seed Money?* 1978. 36 pp. \$2.50. Order from The Teacher Center, Inc., 425 College Street, New Haven, CT 06511.

This monograph case study by a center advisory board member who is a lawyer, examines and evaluates possible sources of funds for her center, which was founded in 1971 as an independent, non-profit organization. The report evaluates possible funding sources, including federal programs, local school district, state department of education, higher education, foundations, corporations, social service agencies, community fund-raising, and fees for services, in order to decide which to pursue. All in all, a con-

sciousness-raising book for a center that must provide at least partial self-support: "We keep working to clarify our values and program priorities, and consider carefully how obtaining funds from each possible source might affect our ability to implement these values and priorities."

Buxton, Amity P. "A Distinctive Option in Inservice, The Teachers' Center Meets Individual Needs and Institutional Goals." Occasional Paper No. 5. 1979. 8 pp. Free. Order from Teachers' Centers Exchange, Far West Laboratory for Educational Research and Development, 1855 Folsom Street, San Francisco, CA 94103.

Using the example of the Oakland Teacher Shelter, Buxton discusses how the polarized relationship between center leaders and school district or university inservice experts can change over time to one of cooperation and collaboration, where both are working to meet the same goals. Buxton, until recently director of the Teacher Shelter, is currently Director of Staff Development for Oakland Unified School District.

Caesar, Elizabeth H., and Caesar, Sanderson, eds. *A Teacher Center's Greatest Hits*. 1980. 170 pp. Free. Order from Philadelphia Teacher-Parent Center, Durham School, 16th and Lombard Streets, Philadelphia, PA 19146.

This is a handbook describing 17 of the most popular, most effective, and most durable items made at a teacher center by teachers and parents. Included with the descriptions are observations by participants (their perceptions of classroom use and of the roles of center staff), presentation, design, fabrication, and maintenance of the items. The research process, documents, and results that led to the handbook are also described.

Caesar, Sanderson. "A Teacher Center Sampler." 1977. 7 pp. \$1.15. Order from Teacher-Parent Center, Durham School, 16th and Lombard Streets, Philadelphia, PA 19146.

Triwall classroom furniture and small teaching aids that can be made at any center.

Chittenden, Edward, et al. *First Year Evaluative Study of the Workshop Center for Open Education, City College of New York*. October 1973. 92 pp. \$1. Order from Workshop Center for Open Education, 6 Shepard Hall, City College, 140th Street and Convent Avenue, New York, NY 10031.

An account of the center's first year of operation with a close look at clientele and staffing. The evaluative team was from Educational Testing Service

in Princeton, NJ. Includes rationale, questionnaires, interviews, and coding schemes.

Connecticut State Department of Education. *A Directory of Connecticut Teacher Centers*. 1979. 25 pp. 75¢. Order from The Teacher Center, Inc., 425 College Street, New Haven, CT 06511.

Two-page descriptions of 12 Connecticut teachers' centers compiled as part of their state-wide networking activities. The resources described in the booklet provide a source of information for individuals and agencies interested in developing a teachers' center.

Devaney, Kathleen. *Developing Open Education in America: A Review of Theory and Practice in the Public Schools*. 1974. 191 pp. \$2.20. Order from National Association for the Education of Young Children, Publications Department, 1834 Connecticut Avenue, NW, Washington, DC 20009.

Some of the first American teachers' centers are described in this report of a study for the National Institute of Education on the structural supports that American teachers need in order to make their classrooms less formal and less dependent on texts and drill. Chapters on the role of the in-classroom advisor, on teachers' development of curriculum in their own classrooms, on parents' involvement, on the principal's role, remain pertinent to teachers' centers today.

Devaney, Kathleen. "Surveying Teachers' Centers—From Grassroots Beginnings to Federal Support." Occasional Paper No. 1. Second edition 1980. 8 pp. Free. Order from Teachers' Centers Exchange, Far West Laboratory for Educational Research and Development, 1855 Folsom Street, San Francisco, CA 94103.

Overview of American teachers' centers from their grassroots beginnings in the early 60s to the federal Teacher Centers Program, which currently supports 99 centers. Details some of the origins, aspects, and attributes of teachers' centers that set them apart from conventional inservice programs, and suggests some principles and problems that may be instructive for persons designing program and policy for federally-funded teachers' centers. Kathleen Devaney is director of the Teachers' Centers Exchange.

Devaney, Kathleen, ed. *Building a Teachers' Center*. 1979. 292 pp. \$10.75 prepaid. Order from Teachers College Press, 1234 Amsterdam Avenue, New York, NY 10027. ERIC ED 171 701.

A collection of 16 articles that give firsthand accounts from teachers' center leaders of aspects involved in starting a teachers' center. The book begins with two papers that relate how a combina-

tion of convictions, experience, high energy, and happenstance formed the first American teachers' centers. Following are essays on practical matters involved in starting a center—staffing, needs assessment, evaluation, space, programming, workshops, advising, managing, budget, advisory board, funding, and self-publishing. Finally, three articles are provided on centers' relationships with school districts and with parents and community.

Devaney, Kathleen, ed. *Essays on Teachers' Centers*. 1977. 199 pp. \$10 prepaid. Make checks payable to and order from Far West Laboratory for Educational Research and Development, 1855 Folsom Street, San Francisco, CA 94103. California residents add sales tax.

A collection of 12 essays about inservice experiences that engage teachers' talents and energies while offering intellectual and emotive stimulation and support. Articles are included on the role of the in-classroom advisor, teacher design of classroom curriculum, and discussions of the varied learning principles underlying teachers' center development and practice. Contributors are Maja Apleman, Sharon Feiman, William Fibkins, Lilian Katz, Robert Mai, Theodore Manolakes, Milbrey McLaughlin, Thomas O'Brien, Adelaide Sproul, and L. C. Taylor. A selected, annotated bibliography is provided. ERIC ED 150 111.

Dropkin, Ruth, ed. *Changing Schools: Open Corridors and Teacher Center*. 1978. 70 pp. \$3.50. Order from Workshop Center for Open Education, 6 Shepard Hall, City College, 140th Street and Convent Avenue, New York, NY 10031.

Accounts of the first ten years of open education in New York City public schools, as remembered during a two-day celebration in April 1978. Included are comments on the building of school communities, developing teachers' centers, reading in the open classroom and an account of present advisory work that former Open Corridor advisors are now doing in new settings.

Edelfelt, Roy A. "Critical Issues in Developing Teacher Centers." *Phi Delta Kappan*. Forthcoming. Single copies \$1.50; \$12/year. Order from Phi Delta Kappa, Inc., Eighth and Union, Box 789, Bloomington, IN 47402.

In this presentation of concerns about teacher center governance, needs assessment, programming, leadership, participation, funding, documentation, and evaluation, Edelfelt, former director of the NEA Teacher Center Project, weaves together information collected during conversations with policy board members and center staffs with observations during visits to centers.

Edelfelt, Roy A. *Teacher Centers and Needs Assessment*. 1980. 25 pp. Single copies free. Order from National Education Association Publications, Room 609, 1201 16th Street, NW, Washington, DC 20036.

This booklet from the NEA Teacher Center Project discusses five ways of finding out what a teachers' center should offer its participants: "Pulling Together Existing Data; Conducting a Survey; Using Observation and Advisors; Conducting Interviews; and Studying Students." An appendix gives three sample instruments and exercises for needs assessment. There is an excellent selected bibliography on inservice and teachers' centers.

Edelfelt, Roy A., and Orvell, Tamar. *Teacher Centers—Where, What, Why?* Fastback 117. 1978. 30 pp. 75¢ (60¢ for PDK members) prepaid. Order from Phi Delta Kappa, Box 789, Bloomington, IN 47402.

This booklet by staff of the Teacher Center Project of The National Education Association includes questions and answers about teacher centers: what is a center; how is it distinct from traditional inservice; what is its function in relation to overall school improvement.

Feiman, Sharon, ed. *Teacher Centers: What Place in Education?* 1978. 209 pp. \$1.50. Order from Center for Policy Study, University of Chicago, Room 200, 580i South Ellis Avenue, Chicago, IL 60637.

Fifty persons from the United States, Canada, and Europe participated in "A Seminar on Teacher Centers" at the University of Chicago in June 1977. This volume contains the papers commissioned for the seminar (sketches of German, British, and United States teachers' centers), reports on principal issues discussed (e.g., curricular change, governance, research and evaluation, information sharing, institutional and developmental concerns, and centers' orientations), and perspectives by the co-chairmen, Sharon Feiman and Dan Lortie.

Feuerstein, Audrey. "Teacher Center for Teachers of the Gifted." *Science and Children*, Vol. 16, No. 6. March 1979. Available in libraries.

A brief description of the purposes, program, and funding of the Teacher Center for the Teachers of the Gifted and Talented at Hunter College. The center began in fall 1977.

Fielding, Glen D., and Hersh, Richard H. *Discovering Teachers' Centers: The Northwest Passage*. 1979. 88 pp. Single copies free. Order from BEST Center, c/o North Eugene High School, 200 Silver Lane, Eugene, OR 97404.

Richard Hersh and Glen Fielding, of the Northwest Cluster, compiled this descriptive survey of the eight federally-funded teachers' centers in Oregon, Washington, Alaska, Montana, and Idaho, during their first year, 1978-79. From these case-study-like descriptions they derived an essay treating major issues in the early development of centers: (1) the philosophy underlying centers—differing interpretations and values placed by differing centers on professional autonomy for teachers; community among teachers; and professional effectiveness; (2) the challenges of establishing centers as new institutions; and (3) what qualities of programming make teachers' centers unique and professionally sound. In addition there are articles on interview-style needs assessments, evaluation, policy board training (how the Eugene BEST Center did it), and Jack Turner's (from BEST) essay on the hard and constant choice teachers (and centers) must make between the "finite" (simple, unidimensional, predictable) and the "infinite" (intangible and indeterminate) strategies for teaching.

Gager, Ron. *Teacher Centers & Secondary School Teachers*. 1980. Single copies free. Order from National Education Association Publications, Room 609, 1201 16th Street, NW, Washington, DC 20036.

Published by the NEA Teacher Center Project, this booklet is addressed to teachers' center leaders and discusses how centers can serve secondary school teachers. It contains experiential inservice activities. Selected readings are included on experiential education, problem solving, and community exploration. Ron Gager is a former staff member of the Kansas City Learning Exchange.

Hockman, Elaine. *The Detroit Center for Professional Growth and Development Governance Board Study of Governance Structures*. 1979. 40 pp. Single copies free. Order from Detroit Center for Professional Growth and Development, 468 College of Education, Wayne State University, Detroit, MI 48202.

Using a sample population of 75 centers, the evaluation specialist at the Detroit Center sent out questionnaires researching ten questions about governance in teachers' centers in the United States. This report gives the purposes of the study, its design, results, and conclusions, especially with respect to the Detroit Center's own governing board and the federal Teacher Center Program's policy board requirements.

Hot Springs Teacher Center. *Southwest Cluster Teacher Centers—Ideas and Resources*. 1980. \$2. Order from Hot Springs Teacher Center, 1111 Spring Street, Hot Springs, AR 71901.

"At some of our first cluster meetings we talked about sharing our local resource persons and ideas and successful practices, but somehow we were never able to share our lists with each other in an orderly way. This booklet, compiled at our two-day meeting from lists prepared ahead of time, has made this good idea a reality." The booklet is an example of one very simple way to compile and share information brought to a meeting.

Illinois State Board of Education. *Teacher Centers: Sources of Support*. 1979. Limited number free. Order from Arnette M. Rauschel, Illinois State Board of Education, Program Planning and Development, 100 North First Street, Springfield, IL 62777.

The following sources of financial support for teachers' centers are listed in this publication: (1) federal government; (2) state departments of education; (3) private foundations; (4) local educational agencies; (5) institutions of higher education and professional organizations.

Katz, Barbara. "A Teacher Center in Action." *American Education*. Published by the US Office of Education (now part of the Department of Education). Vol. 15, No. 7. August-September 1979. Available in libraries.

An article describing the formation, site, program, and staff of the Albuquerque Teachers' Learning Center, which opened in January of 1979.

Koral, Jacqueline. *Daycare Advisory: A Teacher Center Perspective on Staff Development*. 1979. 64 pp. \$3.50. Order from The Teacher Center, Inc., 425 College Street, New Haven, CT 06511.

Reflection and documentation of three years of advisory work in the center's Title XX Early Childhood Daycare Training Program. The report, containing interviews and observations of advisors working with childcare teachers, provides an excellent example of the documentation of a center program that conveys the center's philosophy and style of working as well as details of an advisor's work.

Lance, Jeanne, and Piper, Barbara, eds. *Teachers' Centers Exchange Directory*. 1980. 348 pp. \$12.50. Order from and make checks payable to Far West Laboratory for Educational Research and Development, 1855 Folsom Street, San Francisco, CA 94103. California residents add sales tax.

Gives program information about 161 American teachers' centers (five are in Canada) in touch with the Teachers' Centers Exchange. The centers included have been selected because they are active in

the network of teacher educators served by the Exchange as an information center and communications facilitator. Descriptions in this volume highlight each center's program, needs assessment, evaluation, resources, staff, setting, participation, fees and credit, affiliation, support, and decision making.

Mai, Robert. "Advisors and Staff Development." *The Developer*. National Staff Development Council. August 1978. 4 pp. Order from Patricia Zigarmi, 206 Oakhill Drive, Oxford, OH 45056.

Mai briefly characterizes the art of advising and suggests strategies for building advisors into the staff development structure of the public schools. Four features distinguish advisory work: (1) advisors offer assistance only when requested; (2) assistance is responsive to the teacher's goals and needs; (3) assistance is offered on site; (4) assistance is offered in ways that increase teachers' independence. The latter places some responsibility on the advisor to take the initiative in terminating the relationship. Working with four or five schools on a weekly or biweekly basis over an extended period of time (one to two years) appears to be a good way to deploy advisors. School systems may be able to capitalize on the staff development requirements of various federal programs (mainstreaming, desegregation) to initiate an advisory program.

Maloy, Robert W.; Germain, Steven; and Schilling, Robert F., Jr., eds. *Teacher Centering: A Resource Book for Planning, Developing and Implementing a Teachers' Center*. 1980. 171 pp. \$10. Order from The Teacher Community SEED Center, Crittenden Building, Shelburne Falls, MA 01370.

The goals of American teachers' centers are based on greater teacher control in education, more community involvement in schools, and the shaping of programs around the needs of local communities. However, no single formula for achieving these goals has emerged. *Teacher Centering* looks at the experiences of two programs in neighboring communities in Western Massachusetts—the Teacher-Community SEED Center in Shelburne Falls and the Greenfield Secondary Schools Project—that have approached the development of a teachers' center in different ways. Using personal commentaries and documents, this book highlights major program issues and day-to-day concerns faced by the two programs, allowing readers to "draw ideas, identify problem areas, and select possible options for their own situations . . ." Sections include: project overviews, needs assessments, inservice programming, procedures, ("how to arrange, schedule, publicize, and organize"), administrative issues, program development and funding, and publicity and dissemination.

Martin, Peter H. "Profile of a Rural Teachers' Center." Occasional Paper No. 2. Second edition 1980. Free. Order from Teachers' Centers Exchange, Far West Laboratory for Educational Research and Development, 1855 Folsom Street, San Francisco, CA 94103.

How the school districts of nine rural Connecticut towns collaborate to provide inservice programs (an in-school advisory service, and a teachers' center), for their teachers and administrators, using a combination of funding from districts, state, and federal government. Martin is the director of this program, which is called Project RISE, and located in Colchester, CT.

Massachusetts Department of Education. *Massachusetts Teacher Centers Directory*. 1980. 28 pp. 55¢. Order from Muffy Paradise, Department of Education, Room 536, 31 St. James Avenue, Boston, MA 02116.

Compiled as part of Massachusetts' statewide networking activities, this directory gives location and program information about 11 teacher centers (some federally funded and others locally funded) in Massachusetts. Also lists other resources for teacher centers in the state.

Mertens, Sally K., and Yarger, Sam J. *Documenting Success—A Guidebook for Teacher Centers*. Syracuse Area Teacher Center and the University of the State of New York, State Education Department, Division of Teacher Education and Certification, Albany, NY. 1979. 29 pp. Only available through ERIC ED 180 952.

This guidebook, developed by the Syracuse Area Teacher Center in cooperation with the six regional Documentation Clusters of the Department of Education Teacher Centers Program, is intended to help teacher centers collect and record information about their programs. Chapters include "Figuring Out What to Document," "The Importance of Climate," "Pitfalls to Documentation," and a sample telephone interview, checklist, logbook, activity summary, and process observation.

San Jose, Christine. "Staffing a Teachers' Center: A Joint Venture in Growth and Change." Occasional Paper No. 4. 1978. 12 pp. Free. Order from Teachers' Centers Exchange, Far West Laboratory for Educational Research and Development, 1855 Folsom Street, San Francisco, CA 94103.

Discussion of what is needed in order to staff a teachers' center effectively, both by those responsible for selecting the staff and by the candidates they will interview. San Jose's final word to potential candidates: "Do not even apply for the job

unless you can rely on your sense of humor and your digestion!" Formerly director of the West Genesee Syracuse University Teaching Center, San Jose is an educational consultant in Blackburg, VA.

Schmieder, Allen, and Lovett, Charles. "Teacher Centering for Ongoing Inservice Education." *Action in Teacher Education: Teacher Centers. The Journal of the Association of Teacher Educators*. Vol. II, No. 2. Spring 1980. 110 pp. Single copies \$2 for ATE members, \$4 for non-members. Order from ATE, Suite 1201, 1701 K Street, NW, Washington, DC 20006.

Writing from their experience developing and directing the Teacher Centers Program in the Department of Education, Schmieder and Lovett offer nine basic assumptions and nine assertions about centers "to stimulate discussion about the common ground" that exists in spite of the wide variety in setting and practice. Schmieder gathered the rest of the articles in this issue, which is devoted to teachers' centers. Among them are pieces by Kathleen Devaney, Roy Edelfelt, Patricia Weiler, Gary Sykes, and Bill Fibkins.

Sparks, Dennis. "Teacher Burnout: A Teacher Center Tackles the Issue." *Today's Education*. Vol. 68, No. 4. November-December 1979. Order this or any of the articles listed below free of charge from Northwest Staff Development Center, Wilcox Center, 29530 Munger, Livonia, MI 48154.

This article describes a series of seven workshops offered by the Northwest Staff Development Center to address the issue of teacher stress and burnout. The most frequently requested workshop by both teachers and administrators is intended to reduce isolation, identify sources of job-related stress, identify professional strengths and successful work experiences upon which participants can draw, and to form a plan to prevent or alleviate stress.

Articles by Dennis Sparks on similar or related topics include: "A Biased Look at Teacher Job Satisfaction" (*The Clearing House*, Vol. 52, No. 9, May 1979); "Helping Teachers Manage Stress and Burnout" (*The Developer*, September 1979); "Stress Prevention and Management: A Workshop Approach" (written with Marjorie J. Ingram, *The Personnel and Guidance Journal*, November 1979); "The Challenge Process: A Group Problem-Solving Technique" (*Journal for Specialists in Group Work*, May 1980); "Helping Educators Plan Career Changes" (written with Nancy Allan, *Phi Delta Kappan*, May 1980).

Teachers' Centers Exchange. "Commonality and Diversity in Four Teachers' Centers—Conversation at Chautauqua." Occasional Paper No. 3. 1978. 16

pp. Free. Order from Teachers' Centers Exchange, Far West Laboratory for Educational Research and Development, 1855 Folsom Street, San Francisco, CA 94103.

In an informal conversation at Lake Chautauqua, NY, during Education Week at Chautauqua, four leaders of American teachers' centers (Edith Klausner, Philadelphia Advisory Center for the Improvement of Education; Theresa Lorio, Detroit Center for Professional Growth and Development; David Messerschmidt, Teacher Curriculum Work Center, Chicago; Judith Schulz, Teacher Place, Burlington, WI) explained their work and answered questions put to them by Katherine Farquhar, then curriculum and instruction team leader for the Massachusetts Department of Education. This paper is an edited transcript of that conversation. Also included in the paper: "Remaking the Dream of the Independent Center"—excerpt of a letter from David Messerschmidt to TCWC members offering an overview of the Center's "beginning struggles, crises, and hard work." "Programming the Center"—representative excerpts from the Philadelphia Advisory Center's March 1977 bulletin: "Governance by Consensus"—from Detroit Center for Professional Growth and Development Annual Report 1975-76, Part 1: Activities and Future Directions: "Free Enterprise in a Teachers' Center"—excerpts from a session by Judith Schulz on Survival as a Nonprofit Institution, St. Louis Workparty, June 1977, sponsored by the Exchange.

Thomas, Gretchen. "The Advisor: Emissary from Teachers' Center to Classroom." Occasional Paper No. 6. 1979. 20 pp. Free. Order from Teachers' Centers Exchange, Far West Laboratory for Educational Research and Development, 1855 Folsom Street, San Francisco, CA 94103.

Paraphrased and quoted thoughts from the journals and notes of participants at an Exchange-sponsored workparty, September 1977, describe advisory work and its relation to teachers' centers. Topics discussed are: "Differences Between Advisory Work and Other Staff Development"; "Purposes of Advisory Work"; "Methods Advisors Use"; "Realistic Expectations of the Advisor Role: Dilemmas and Discouragements"; "Characteristics, Skills, and Experiences Advisory Work Requires"; "Selection, Training, and Ongoing Development of Advisors"; "Relationship of Advisory Work to Teachers' Centers." Also includes annotated bibliography of recommended reading about the advisor role. Gretchen Thomas is on the staff of the Teachers' Centers Exchange.

Van Fleet, Alanson. "Teacher Centers in Florida: A Case Study." *School Review* 85, 3 (May 1977): 412-424. Single copies \$4.50. Order from *American Jour-*

nal of Education, University of Chicago Press, 5801 South Ellis Avenue, Chicago, IL 60637.

The Florida teacher centers established by the State Legislature in 1973 are collaborations by school districts, universities, and teacher organizations to provide preservice and inservice training. This article by the program documenter analyzes their experience during 1974-75 in collaborative decision making, program development, and finance; discusses some of their problems in running programs; and offers cautionary advice on starting a teacher center under federal or state funding.

"The fact that institutions and individuals had to cooperate in ways new to them . . . resulted in problems of meeting deadlines, maintaining partnership arrangements, and organizational strain. Because teacher education centers were grafted onto existing institutions, reward systems became a crucial problem in sustaining participation. Problems of needs assessment and grass roots support arise from the fact that teacher centers were put into effect from the top down rather than growing out of local concerns and purposes. . ."

Vermont Department of Education, *Resource Agent Program Catalogue*. 1979. 17 pp. Single copies free. Order from Division of Federal Programs, Vermont Department of Education, Montpelier, VT 05602.

"RAP is a service provided by the Vermont Department of Education to assist teachers who wish to introduce new and effective practices into their classrooms. It is a way to recycle educational practices. Each Resource Agent has developed a special activity or project that has been tried and tested, usually in their classroom. You will find ideas for teaching math, outdoor and environmental education, reading, community learning, and many other suggestions among the RAP workshop descriptions. Resource Agents are available to provide Resource Workshops and follow-up visits throughout the school year. A Resource Agent may make visits to a group of teachers who are interested in developing similar activities for their own classrooms. In their workshops, Agents share their skills and ideas as well as some of the pitfalls they have encountered in developing their projects. They can provide a small amount of materials needed to get an activity going in the classroom. But most importantly, they offer a source of support in the process of developing an idea into an effective learning experience." This is a handbook from which teachers' centers can learn about the organization of teacher talent banks.

Ward, Wanda. "So You Want to Start a Teachers' Center." *Instructor*. April 1980. Single copy \$2. Order from *Instructor*, Instructor Park, Dansville, NY 14437.

A lively article describing how teachers in the Pittsford, NY school district formed a governing board that applied unsuccessfully for federal funds for their center, but went ahead using school district staff development monies.

Watt, Anne S. "The Role of a Rural Teacher Center in Developing and Delivering Inservice Education Programs." *The Developer*. March 1979. 8 pp. \$1.25. Order from Patricia Zigarmi, 206 Oakhill Drive, Oxford, OH 45056.

"This article looks at how top-down and bottom-up inservice programming have taken place in a rural teacher center in southern Vermont, and notes some painful lessons learned in the process, which may be instructive for new teacher centers as they develop policy and implement their inservice programs." It also discusses the Mountain Towns' Teacher Center's advisor program.

Watts, Heidi. *A Baker's Dozen: 13 Examples of Change in Classrooms as a Result of Teacher Center Activity in Vermont*. Montpelier: Adult Education Services, Department of Education. 1979. \$1. Order from Henry Bissex, Vermont Department of Education, Montpelier, VT 05602.

From Anne Watt's journal of her in-classroom advisory work with teachers during the time she was director of Mountain Towns' Teacher Center, Heidi Watts, her successor (now director of Grass Roots Teacher Center, Cortland, NY), wrote this booklet of "13 examples of change in classrooms as a result of teacher center activity." The descriptions of specific work with real teachers, the photos, calligraphy, sketches, paper, layout—all add up to an exemplary documentation of teachers' center work.

Yarger, Sam J., and Mertens, Sally K., *Documenting Teacher Centers—Report of a Field Test*. 1979. 90 pp. Single copies free. Order from Syracuse Area Teacher Center, 400 Huntington Hall, 150 Marshall Street, Syracuse, NY 13210.

In May and June of 1979 a field test of documentation strategies was conducted, involving eight teachers' centers in their first year of support from the Office of Education's (now the Department of Education) Teacher Centers Program. The intent was to determine the relative value of two documentation strategies: mailed questionnaires and telephone interviews. The field test report is informative for centers interested in documentation, and it offers some information about the eight centers, including program descriptions and amount of teacher involvement.

Ziegler, Betsy, and Alden, Tom. *A Guide to Community Sources*. 1979. \$3.50. Order from Mountain Towns' Teacher Center, Deerfield Valley Elementary School, Wilmington, VT 05363.

An excellent example of how many teachers' centers—in this case through a CETA project—form a bridge between the schools and learning possibilities in the community. In the process of finding and working with people, organizations, and businesses that are willing to share their knowledge and craft with others, the center builds positive relations with the community for the entire school system as well as for itself. This recognition of the role local communities can play in schools and in teacher education is a characteristic of teachers' centers that distinguishes them from conventional inservice programs. Betsy Ziegler has written a description of how the *Guide* was compiled and printed.



Periodicals

Art and the Integrated Day. Occasional publication. 60 pp. \$4. Order from G.A.M.E., 314 West 54th Street, New York, NY 10019.

Issue No. 3, Autumn 1979, contains articles such as "Culture, Cognition, and IQ Testing," by Michael Cole, "Starting from the Grassroots," by Eleanor Duckworth and Denis Cassivi, and "Proverbs and Social Values," by Stella Dennis. Issue No. 4, Autumn 1980, is on the theme of culture, art, and education.

Children's Thinking Newsletter. \$31/year. Order from Peggy Stubbs, 233 Elmore St., 4, Concord, MA 01742. Make checks payable to *Children's Thinking Newsletter*.

Several years ago Bill and Sara Hull of Cambridge, MA, began small discussion groups of elementary teachers who met regularly to talk about their perceptions of how classroom experiences reveal the differing ways that children think. The discussions were taped and one group member wrote notes and commentary from transcripts of the discussion, which were circulated to participants. Out of the discussions and the commentaries have come generalizable insights into the teachers' practice and starting points for individual teachers' growth.

With the proliferation of children's thinking seminars around Boston (and in Oakland, Los Angeles, Philadelphia, North Dakota), participants have begun publishing a newsletter three times a year. It contains excerpts from discussions, teachers' writing about their classrooms, curriculum development, book reviews, and other commentaries about how children learn. Teachers' centers that want to stimulate teachers to observe children more thoughtfully and to use their own classrooms as "laboratories" for such investigation, may find the Newsletter illustrative of what a children's thinking seminar can accomplish. Also see (in the "About Learning" section) booklets by Kathe Jervis and Bill Hull on children's thinking seminars.

First Teacher (published monthly for relatives, teachers, and other adult friends of preschool children) 12 issues for \$15; *First Teacher for Parents* (published monthly for relatives and adult friends of young children) 12 issues for \$10. Order from Box 1308T, Fort Lee, NJ 07024.

Typical articles include: recipes for bread and soup; taking a preschooler shopping at a department store; fingerpainting tips; helping children deal with separation. The papers are produced by staff of The Teachers' Center at Fairfield, CT.

Insights Into Open Education. 12 pp. \$3.50/year (8 issues). Order from and make checks payable to *Insights*, Center for Teaching and Learning, Box 8158, University of North Dakota, Grand Forks, ND 58202.

A newsletter, published since 1967, usually organized around one topic, such as mainstreaming special education students, human relations, children's writing, energy education, or photography.

In Touch. 40 pp. \$4/year (four issues); single issues, including back issues, \$1.25. Order from and make checks payable to *In Touch*, School of Education, University of Massachusetts, Amherst, MA 01003.

A forum for sharing information on the open classroom or the integrated day, published since 1970. Includes theories, practices, classroom activities, questions, surveys, and annotated bibliographies on classroom topics such as sex education, environmental education, metrics, or critical reading. Masha Rudman, co-director of the Integrated Day Program at the University of Massachusetts, Amherst, is consulting editor.

National Staff Development Council, c/o Patricia Zigarmi, 206 Oakhill Drive, Oxford, OH 45056.

Membership fee in NSDC is \$24/year and offers members 12 issues of *The Developer* and two issues of *The Journal of Staff Development*.

The Developer. A monthly newsletter of NSDC that publishes lead articles by teachers and staff development practitioners. Single copies \$1.25 each; yearly subscription \$15; or included free in membership to NSDC.

The Journal of Staff Development. A twice yearly journal published by NSDC and edited by Patricia Zigarmi and Lynne Miller. The first issue, May 1980, focuses on working with secondary teachers and contains articles by several participants in Teachers' Centers Exchange Workparties on teachers' centers serving secondary teachers; among them are Nancy Kreinberg on math for girls; Keith Caldwell on Bay Area Writing Project; Howard Shapiro on Foxfire in Vermont; Sharon Miller and Marilyn Sweeney on peer counseling; Merrita Hruska and Mason Bunker on forming support networks of teachers. The Fall 1980 issue is on "Adult Learning Theory and Its Implications for Staff Development." 101 pp. Single copies \$8; yearly subscription for non-members of NSDC \$16; two issues/year included free in membership to NSDC.



Notes From Workshop Center For Open Education. 48 pp. Back issues 75¢ each. *Cumulative Index 1972-79*, \$1. Order from Workshop Center for Open Education, 6 Shepard Hall, 140th Street and Convent Avenue, New York, NY 10031.

Between 1972 and 1979 this quarterly journal published short articles on classroom and school organization, and curriculum by staff members and teacher participants of the Workshop Center for Open Education at City College. Back issues offer a wealth of ideas and idealism for teachers' center practitioners.

OUTLOOK. Quarterly. 56 pp. Individuals \$12/year, two years for \$20; institutions \$18/year. Order from Mountain View Publishing Company, 2929 6th Street, Boulder, CO 80302.

A national education quarterly published since 1970, *OUTLOOK* presents discussions of teaching and learning, case histories of successful classroom situations, and articles on many content areas, often written by scientists, artists, mathematicians, as well as by teachers. Published in collaboration with the Mountain View Center for Environmental Education, it is edited by Tony Kallet.

Penny Power. 29 pp. Six issues per year, September through June. Single subscription \$7.50. School subscriptions (minimum of 10 orders) \$4.50 each. Order from *Consumer Reports*, Dept. RS-46, Orangeburg, NY 10962.

Penny Power is a collaborative effort of Consumers Union and the Fordham District 3 Learning Center. The teachers and elementary school students in the project design the high-interest consumer education magazine focusing on the skills and attitudes students need as consumers. Topics include evaluation of products (jeans, tennis shoes, peanut butter), advertising effects, consumer rights, recycle skills (home bicycle repair). Each issue comes with a teacher's guide.

Seedbed. Occasional publication. 110 pp. \$1. Back issues available for \$1 each. Order from Teachers' Center Project, Box 122, Southern Illinois University, Edwardsville, IL 26026.

"This is not an ordinary journal. It's a journal by teachers for teachers.... It is a collection of teachers' ideas, ideas they thought worth sharing with other teachers as seedlings to be developed." The ideas are stimulated by the Teachers' Center Project's regular seminars on math and children's thinking.

"As will be immediately clear from the articles herein, teachers are capable of immensely rich thinking. And, as is also clear from this Journal and from the seven years of work of the Teachers' Center Project,

teachers as a professional group are quite capable of bringing health to American education."

Articles include: "Right Angle Paths," "My Math Education Is Gone," "Personalized Sentences," "What's My Rule," "The Story of a Problem," and "Katie and the Chevrolet."

Tapestry. Journal twice yearly (four issues currently available). 75¢ copy. Order from Teachers' Workshop, Emerson Elementary School, 2421 East Johnson Street, Madison, WI 53704.

The Teachers' Workshop in Madison publishes a journal for local teachers to explore ideas, express opinions on current issues, and share learning experiences. The Fall 1979 issue contains articles on American Indians in the curriculum, parents and teachers working together, and teaming speech and language with a learning disabilities program.

Teachers & Writers Magazine. 48 pp. Three issues/year \$5; six issues \$9; nine issues \$12. Order from Teachers & Writers, 84 Fifth Avenue, New York, NY 10011.

This magazine publishes articles about the creation of a language arts curriculum "relevant to the lives of children." Professional artists working collaboratively in New York City classrooms with teachers who are "interested in new ways of looking at creativity" keep detailed diaries of their work. These diaries along with the work of students are the raw materials for articles published in *Teachers & Writers Magazine*.



(w) **FAR WEST LABORATORY** FOR EDUCATIONAL RESEARCH AND DEVELOPMENT
3000 N. M STREET, ANAHEIM, CALIFORNIA 92806

Teachers
Centers
Exchange